

New Zealand Government

briefing notes road safety issues

Marlborough District

NZ Transport Agency has prepared this road safety issues report. It is based on reported crash data and trends for the 2004–2008 period.

This report is the tenth road safety report for Marlborough District. Most of the information, unless otherwise stated in this report, applies to both local roads and state highways.

The intent of the report is to highlight the key road safety issues and assist in identifying possible ways to reduce the number of road deaths and injuries in the district. More detailed information may be obtained from either Marlborough District Council (local roads) or NZ Transport Agency. Please refer to the last page for contact details.

The issues chosen for this report are drawn from either the most common crash types, those that appear over-represented when Marlborough District is compared to similar authorities and those crashes with a high social cost (relating mainly to high numbers of fatal and serious crashes).

We have also included a brief overview of crashes in Marlborough District for 2008.

Major road safety issues	2008 road trauma		
Marlborough District	Casualties	Marlborough District	
Loss of control at bends	Deaths	1	
Crossing/turning	Serious injuries	33	
Vulnerable road users: cyclists	Minor injuries	141	
Speed	Total casualties	175	
Fatigue			
National issues	Crashes	Marlborough District	
Speed	Fatal crashes	1	
Alcohol	Serious injury crashes	27	
Failure to give way	Minor injury crashes	98	
Restraints	Non-injury crashes	261	

Overview 2008

In 2008 in Marlborough District there were 126 injury crashes and 261 non-injury crashes reported by the New Zealand Police. Forty-eight percent of the total injury crashes in the district were on state highways. The table below shows the number of injuries resulting from these crashes in the district.

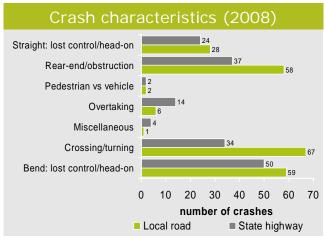
Casualties by injury type in 2008				
	Fatalities	Serious	Minor	Total
Total	1	33	141	175
Lo	ocal roads	vs state h	nighways	
Local	1	16	82	99
State	0	17	59	76
Rural vs urban roads				
Rural ¹	1	26	82	109
Urban	0	7	59	66

Note: 1/ Rural - area with a speed limit of 80km/h or more

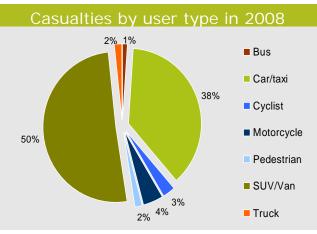
The latest five year trends show the total number of fatal and serious injury crashes to be decreasing. The ten year trend shows a decrease in fatal crashes and an increase in the number of serious injury crashes.



The main type of crash (of all crashes in the district, both injury and non-injury combined) in 2008 was *lost control/head-on at bend* followed by *crossing/turning* and *rear end/obstruction* crash movement types.



Half the casualties in 2008 were drivers and passengers of SUV/Van. Meanwhile vulnerable road users (pedestrians/cyclists/motorcyclists) constituted 9 percent of all casualties.



Further information about all crashes in 2008 on:

Local roads

- Worst months: April and December (12 percent each)
- Worst day of week: Saturday (20 percent)
- Wet road crashes: 20 percent
- Night time crashes: 32percent
- Alcohol over limit (injury crashes): 18 percent
- Too fast for conditions (injury crashes): 20 percent
- Crashes at intersection: 45 percent
- Road factors: 8 percent
- At fault male driver (injury crashes): 67 percent
- At fault driver held full NZ licence (injury crashes): 56 percent

State highways

- Worst months: April and June (10 percent each)
- Worst day of week: Friday (20 percent)
- Wet road crashes: 20 percent
- Night time crashes: 30 percent
- Alcohol over limit (injury crashes): 11 percent
- Too fast for conditions (injury crashes): 23 percent
- Crashes at intersection: 35 percent
- Road factors: 9 percent
- At fault male driver (injury crashes): 66 percent
- At fault driver held full NZ licence (injury crashes): 48 percent

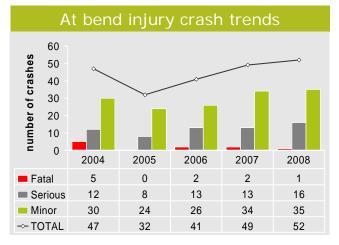
Social cost of crashes		
Local roads	\$ 18.83M	
State highways	\$ 15.85	
Total \$ 34.68M		

NOTE: The estimated social cost includes loss of life or life quality, loss of output due to injuries, medical and rehabilitation costs, legal and court costs, and property damage.

Loss of control at bends

During the most recent five year period 2004-2008) 26 percent of all injury crashes in the Marlborough District occurred due to loss of control at bends. These crashes resulted in 10 deaths, 77 serious injuries and 230 minor injuries. There were a further 299 non-injury crashes reported involving loss of control at bends.

The latest five year data show an increasing trend in the total number of injury crashes due to loss of control at bends with the highest number recorded in 2008.



The following table shows the split between loss of control crashes at bends (520 crashes) on local roads and state highways also split to show urban and rural limits.

Loss of	Local		SH	SH
control	urban		urban	rural
At bends	18%	33%	5%	44%

Most crashes at bends involved a driver losing control of their vehicle and running off the road and hitting a roadside object (75 percent) or perhaps colliding with another vehicle (24 percent).

The three most common roadside hazards struck in loss of control at bend crashes were *fences* (21 percent) followed by *over banks*, *ditches* and *banks* (14 percent each) for a total of 556 reported objects struck. Hitting these objects can result in more serious injuries than would otherwise be sustained.

Nearly half (48 percent) of the at fault drivers in these crashes were aged under 29 years of age, mostly male (72 percent) and over a third (27 percent) held either a learner licence, a restricted licence or were never licensed.

The following table shows the main characteristics of these loss of control at bend crashes. Threequarters of these crashes were on rural roads. A quarter of these crashes were in wet conditions. A third recorded speed too fast. Alcohol was a contributory factor in a fifth of these crashes.

Loss of control crashes at bends

Crash characteristics	Percentage of crashes
Single vehicle	76%
Alcohol (injury crashes)	20%
Too fast for the conditions (injury crashes)	36%
Road factors	16%
Poor handling (injury crashes)	39%
Rural road	77%
Wet road	25%
Night time	38%

Further information about all loss of control crashes at bends in Marlborough District 2004-2008 on:

Local roads

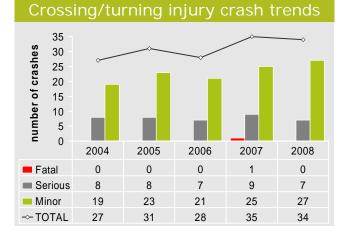
- 3 deaths, 34 serious injuries and 100 minor injuries
- Worst month: December (14 percent)
- Worst days of week: Saturday (54 crashes)
- Wet road crashes: 23 percent
- Night time crashes: 41 percent
- Alcohol over limit (injury crashes): 23 percent
- Most common injury crash factors: too fast (39 percent) and poor handling (35 percent)
- At fault male driver (injury crashes): 74 percent
- At fault driver held full NZ licence (injury crashes): 54 percent
- Most common at fault drivers' age group (injury crashes): 15-19 years old

- 7 deaths, 43 serious injuries and 130 minor injuries
- Worst month: January (16 percent)
- Worst day of week: Sunday (44 crashes)
- Wet road crashes: 27 percent
- Night time crashes: 35 percent
- Alcohol over limit (injury crashes): 18 percent
- Most common injury crash factors: poor handling (42 percent) followed by too fast (34 percent
- At fault male driver (injury crashes): 71 percent
- At fault driver held full NZ licence (injury crashes): 58 percent
- Most common at fault drivers' age group (injury crashes): 15-19 years old

Crossing/turning

During the most recent five year period (2004-2008) in Marlborough District, 25 percent (155 crashes) of all injury crashes involved either a crossing or a turning movement. These crashes resulted in 1 death, 46 serious injuries and 165 minor injuries. There were a further 306 non-injury crashes reported.

The latest five year data show an increasing trend in the total number of crossing/turning injury crashes in the district recording the highest number in 2007 with 1 fatality and 9 serious injuries.



During the last five year period 2004-2008, there were 389 crashes at intersections; 88 percent recorded failing to give way or stop as a factor. There were 69 crossing/turning crashes at driveway junctions.

The table below shows the location of intersections with the high number of crashes (2004-2008).

Intersection name	Total crashes 2004- 2008	Injury crashes 2004- 2008	Total crashes in 2008
Maxwell Road/ Seymour Street	16	9	3
High Street/ Seymour Street	18	4	2
Weld Street/ Alabama Road	12	4	3
High Street/ Henry Street	12	3	2
Seymour Street/ George Street	10	2	2

Majority of (68 percent) of at fault drivers held a full NZ drivers' licence in these crossing/turning injury crashes while 15 percent held either a learner or a restricted licence.

Crashes at crossroads in urban areas are the most common type of intersection crash reported, followed by roundabouts at urban areas, as shown in the following table.

Number of crossing/turning crashes 2004-2008				
Junction type	Rural	Urban		
T-junction	35	57		
Driveways	22	47		
Crossroad	22	173		
Y-junction	1	2		
Roundabout	0	94		
Unknown	0	7		

The most common movements associated with crossing/turning type crashes are:

- collision between straight through vehicles travelling on roads that meet at right angles or thereabouts (45 percent).
- vehicle turning right from a side road or driveway being hit from the right by a vehicle travelling straight through (19 percent).

Further information about crossing/turning crashes in the district 2004-2008 on:

Local roads

- 1 death, 25 serious injuries and 102 minor injuries
- Worst month: May (34 crashes)
- Worst day of week: Tuesday (54 crashes)
- Wet road crashes: 14 percent
- Night time crashes: 17 percent
- Alcohol over limit (injury crashes): 4 percent
- Most common injury crash factors: failed to give way/stop (87 percent) followed by poor observation (69 percent)
- Road factors: 7 percent
- At fault male driver (injury crashes): 54 percent
- At fault driver held full NZ licence (injury crashes): 71 percent
- Most common at fault drivers' age group (injury crashes): 70+ years old

- 21 serious injuries and 63 minor injuries
- Worst month: November (19 crashes)
- Worst day of week: Friday (42 crashes)
- Wet road crashes: 18 percent
- Night time crashes: 24 percent
- Alcohol over limit (injury crashes): 3 percent
- Most common injury crash factors: failed to give way/stop (89 percent) followed by poor observation (68 percent)
- Road factors: 4 percent
- At fault male driver (injury crashes): 52 percent
- At fault driver held full NZ licence (injury crashes): 64 percent
- Most common at fault drivers' age group (injury crashes): 15-24 years old

Vulnerable road users

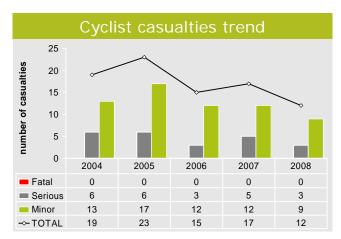
Vulnerable road users are those who have very little physical protection in the event of a crash and are therefore susceptible to severe injuries. These are pedestrians, motorcyclists and cyclists.

In Marlborough District, vulnerable road users were involved in 28 percent of all injury crashes over the last five year period (2004-2008) resulting in 6 deaths, 54 serious injuries and 126 minor injuries.

Cyclists

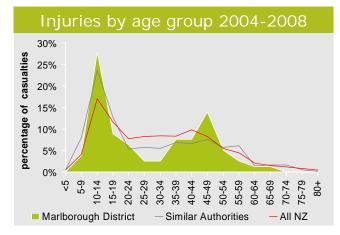
Injury crashes involving cyclists in Marlborough District accounted for 13 percent of all injury crashes in the last 5 year period resulting in 23 serious injuries and 63 minor injuries.

The latest five year trends show that the number of casualties involved in cyclist crashes is decreasing.



Most (88 percent) crashes involving cycles occurred on urban roads, 68 percent at intersections and 87 percent during daylight hours.

Injured cyclists are not spread evenly across all age groups. Thirty-seven percent of the injured cyclists were between 10 and 19 years of age which is equal to the similar authorities' average for this age group. Fourteen percent of injured cyclists were in the group 45-49 years of age, higher than the similar authorities' average.



The scenarios for crashes involving cyclists were many and varied. The most common scenarios for cyclist injury crashes were:

- collision between straight through vehicles travelling on roads that meet at right angles or thereabouts: 36 percent
- a vehicle (or cycle) making a left turn from a sideroad or driveway and is struck or strikes a vehicle travelling straight through the intersection: 12 percent

Forty-one percent of cyclist injury crashes show a party failed to give way at a give way sign. In fact 61 percent of cyclist injury crashes record failure to give way as a factor. Thirty-nine percent of cyclist crashes were due to one of the parties failure to see or look when required to give way to traffic from another direction. Nine percent involved a cyclist riding on the footpath.

The high crash locations/routes for cyclist crashes in the district are shown in the table below:

High cyclist crash locations/routes		
SH6 route Blenheim through Renwick: 19 crashes		
Maxwell Road route: 16 crashes		
Alabama Road route: 9 crashes		
Intersection SH1S / SH6: 7 crashes		
Intersection Maxwell Rd / Seymour St: 7 crashes		
Intersection Alabama Rd / Redwood St: 5 crashes		
Intersection SH1S / Park Tce: 3 crashes, serious injury		

Further information regarding crashes involving cyclists in Marlborough District 2004-2008 on:

Local roads

- 13 serious injuries and 38 minor injuries
- Worst month: March (11 crashes)
- Worst day of week: Wednesday (15 crashes)
- Most common injury crash movement: crossing/turning movement (67 percent)
- Crashes at intersection: 75 percent
- Wet road crashes: 12 percent
- Night time crashes: 13 percent

- 10 serious injuries and 25 minor injuries
- Worst months: February, June and July (4 crashes each)
- Worst days of week: Thursday and Friday (7 crashes each)
- Most common injury crash movement: crossing or turning movement (68 percent)
- Crashes at intersection: 55 percent
- Wet road crashes: 10 percent

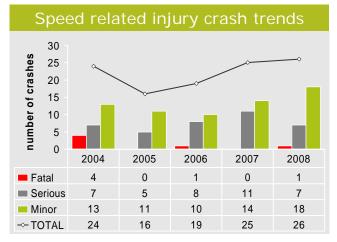
Speed

Nationally, speed is one of the major contributing factors to road crashes. In 2008, excessive speed contributed to around 34 percent (113 numbers) of fatal crashes and 17 percent (1935 numbers) of injury crashes in New Zealand.

In Marlborough District, travelling too fast for conditions was a factor in 21 percent of all injury crashes in 2008, higher than the five year average (18 percent).

During the last five year period (2004-2008) there were 110 speed-related injury crashes resulting in 6 deaths, 43 serious injuries and 125 minor injuries. There were also 176 non-injury crashes recorded for the same period.

The latest five year data show a slightly increasing trend in the total number of speed related injury crashes after a fall in 2005, with the highest total recorded in 2008.



More than half (59 percent) of the speed related crashes occurred in rural areas. In 2004 there were 47 speed related crashes on rural roads that was the highest in the last 5 year period.

Speed related crashes					
	2004	2005	2006	2007	2008
Urban	22	16	27	31	23
Rural	47	28	26	33	33
Total	69	44	53	64	56

Approximately half (47 percent) of the speed related crashes occurred on weekend, between Friday 6pm and Monday 6am. Forty-five percent of the speed related crashes occurred during the night time.

More than half (52 percent) of the at fault drivers in speed related injury crashes were less than 25 years old. Thirty-five percent of the at fault drivers on these crashes were holders of a learner or a restricted licence. Males represented 79 percent of at fault drivers in speed related injury crashes.

Age and gender of at fault drivers			
Age (years)	Male	Female	Total
15 - 19 years	33	6	39
20 - 24	13	4	17
25 - 29	10	2	12
30 - 39	10	4	14
40 - 49	9	5	14
50 - 59	5	2	7
60 - 69	4	0	4
70+	2	0	2
Total	86	23	109

Speed and alcohol

Speed combined with alcohol was a factor in 17 percent of the 110 speed related injury crashes in the district 2004-2008, resulting in 11 serious injuries and 14 minor injuries. Alcohol itself has been a factor in 15 percent of all injury crashes in the district in the last five years.

In these speed and alcohol related injury crashes, 40 percent of at fault drivers were in the 15-19 year age group and 90 percent of at fault drivers were male. Sixty-eight percent of the crashes, speed and alcohol, occurred on local roads, involved mostly a single vehicle (84 percent) and occurred during hours of darkness (80 percent). Most of these were loss of control at bend type crashes (80 percent).

Further information about speed related crashes in Marlborough District 2004-2008 on:

Local roads

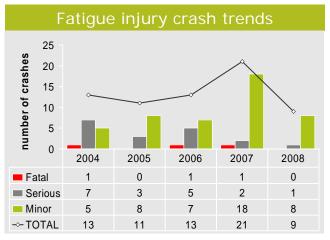
- 3 deaths, 23 serious injuries and 76 minor injuries
- Worst day of week: Saturday (35 crashes)
- Wet road crashes: 20 percent
- Night time crashes: 47 percent
- Alcohol over limit (injury crashes): 19 percent
- Most common injury crash factor: bend-loss of control (66 percent)
- At fault male driver (injury crashes): 82 percent
- Most common at fault drivers' age group (injury crashes): 15 to 19 years old

- 3 deaths, 20 serious injuries and 49 minor injuries
- Worst day of week: Saturday (24 crashes)
- Wet road crashes: 34 percent
- Night time crashes: 42 percent
- Alcohol over limit (injury crashes): 22 percent
- Most common injury crash factor: bend-loss of control (66 percent)
- At fault male driver (injury crashes): 76 percent
- Most common at fault drivers' age group (injury crashes): 15 to 39 years old

Fatigue

During the most recent five year period (2004-2008) fatigue was reported as a factor contributing to 11 percent (67 injury crashes) of all injury crashes in Marlborough District. These crashes resulted in 3 deaths, 23 serious injuries and 71 minor injuries. There were a further 55 non-injury crashes reported.

The latest five year data shows an increasing trend in the total number of injury crashes through to 2007, followed by a significant decrease in 2008.



Most (75 percent) of the fatigue related crashes occurred on state highways in the rural areas. Of the 67 state highway injury crashes, 35 were on SH1S and 15 were on SH6 and 4 on SH 63. The following table shows the causes of fatigue and their contribution to injury crashes for the period 2004-2008 in the Marlborough District.

Fatigue 2004-2008			
	Percentage of injury crashes		
Fatigue causes	Marlborough District	New Zealand	
General (drowsy, tired, fell asleep)	8.5%	4.7 %	
Long trip	1.1%	0.2 %	
Lack of sleep	1.3%	0.8 %	
Worked long hours before driving	0.3%	0.3 %	

Thirty-eight percent of fatigue related crashes occurred on a weekend, between 6pm Friday and 6am Monday. Forty-eight percent of the fatigue related crashes occurred during the hours of darkness/twilight.

Approximately 40 percent of drivers at fault in fatigue related injury crashes were between 15 and 24 years of age. Three-quarter of at fault drivers were male.

Fifty-eight percent of at fault drivers involved in fatigue related injury crashes held full NZ licence. Nearly a quarter (24 percent) of at fault drivers held either a restricted or a learner licence.

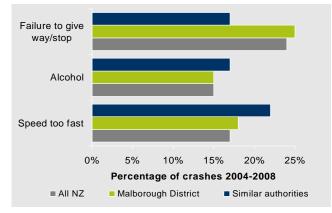
Further information about all fatigue related crashes in Marlborough District 2004-2008 on:

Local roads

- 3 serious injuries and 12 minor injuries
- Worst months: May, July and November (13 percent each)
- Worst day of week: Tuesday (5 crashes)
- Wet road crashes: 9 percent
- Night time crashes: 48 percent
- Alcohol over limit (injury crashes): 42 percent
- Most common injury crash factors: poor handling (33 percent) followed by failed to keep left and vehicle factors (17 percent each)
- Road factors: 4 percent
- At fault male driver (injury crashes): 83 percent
- At fault driver held full NZ licence (injury crashes): 67 percent
- Most common at fault drivers' age group (injury crashes): 15 to 19 years old

- 3 deaths, 20 serious injuries and 59 minor injuries
- Worst month: January (17 percent)
- Worst day of week: Sunday (19 percent)
- Wet road crashes: 12 percent
- Night time crashes: 47 percent
- Alcohol over limit (injury crashes): 27 percent
- Most common injury crash factors: poor handling (24 percent) followed by failed to keep left (9 percent)
- Road factors: 4 percent
- At fault male driver (injury crashes): 73 percent
- At fault driver held full NZ licence (injury crashes): 55 percent
- Most common at fault drivers' age group (injury crashes): 15 to 24 years old

National issues



Speed

In Marlborough District, speed too fast for conditions was recorded in 18 percent of injury crashes in the last five years resulting in 6 deaths and 167 injures. Speed as a factor in crashes is increasing in the district.

Seventy-two percent of speed related crashes were *lost control/head-on at bend* crash movement types. *Alcoho*l and *poor handling* are the driver factors most often associated with the *speed* related crashes. Male drivers aged under 20 years old were the group most involved in these crashes.

Alcohol

In Marlborough District, alcohol was involved in 15 percent of injury crashes in the last five years resulting in 8 deaths and 125 other injuries. The number of injury crashes involving alcohol is steady.

Sixty-three percent of alcohol crashes were in rural areas. Seventy-nine percent of these crashes involved *lost control/head-on* crash movement types. *Fatigue, travelling too fast* and *poor observation* were factors often associated with alcohol related crashes.

Failure to give way

In Marlborough District, *failure to give way or stop* was reported in 25 percent of all reported injury crashes for the last five years resulting in 2 deaths and 209 other injuries. Most (90 percent) of these crashes are related to *crossing/turning* manoeuvres and often associated with *failure to look* for other parties. Fifty-four percent of at fault drivers involved in these crashes were male.

Restraints

The Ministry of Transport conducts surveys of restraint use. According to 2008 survey results restraint use rate in Marlborough District for front seat and rear seat are 97 and 65 percent respectively (while corresponding national rates are 95 and 87 percent). The results are obtainable from the Ministry of Transport website.

http://www.transport.govt.nz/research/safetybeltstatistics/

Contacts

NZ Transport Agency

Wellington Regional Office

PSIS House, L9 20 Ballance Street PO Box 5084 Wellington 6145 Tel 64 4 894 5200 Fax 64 4 894 3305 http://www.nzta.govt.nz

Wellington Regional Director Deborah Hume (04 894 6417)

Programmes & Funding Manager Peter Hookham (04 894 5249)

Senior Programmes Advisor (Engineering) Eddie Anand (04 931 8920)

Senior Programmes Advisor (Education) Roy Hitchcock (04 931 8910)

Highways & Network Operations (Safety Manager) Fabian Marsh (04 894 5222)

Performance Measurement Manager Balt Gregorius (04 894 6156)

Senior Engineer (Performance Information - CAS) James King (04 931 8917)

Marlborough Roads

Marlborough Roads PO Box 1031 Blenheim

Roading Manager Frank Porter (03 577 1850) Road Safety Coordinator Vacant position

New Zealand Police

Road Policing Manager Hugh Flower (03 546 3855) Tasman District Headquarters Private Bag 39 Nelson Tel 03 546 3840