

CONTENTS

Page

INTRODUCTION

Background to the report	iv
Main features of road traffic crashes in Queensland 2000	v
Road Crash Database	vi

1. ROAD TOLL IN CONTEXT

1.1 Road fatality trends	1
1.2 Road casualty trends.....	2
1.3 Trends in total reported crashes.....	3
1.4 Queensland in relation to Australia.....	4
1.5 Factors behind the road toll	6
1.6 The major contributors to the 2000 fatal road toll.....	6
1.7 Proposed next steps	7

2. CHARACTERISTICS OF ROAD USERS INVOLVED IN CRASHES

2.1 Introduction	9
2.2 Trend	9
2.3 Children.....	13
2.4 Young adults	14
2.5 Mature age road users	16
2.6 Older road users	19

3. UNITS IN CRASHES

3.1 Introduction	22
3.2 Fatal crash involvement by unit type	24
Cars and variants	24
Heavy freight vehicles	24
Heavy freight vehicles	25
Buses	25
Motorcycles	26
Bicycles.....	26
Pedestrians	27

4. CHARACTERISTICS OF CRASHES

4.1 Introduction	28
4.2 Comparative trends.....	28
4.3 Multi-vehicle crashes.....	30
4.4 Single vehicle crashes.....	31
4.5 Crashes by time of day.....	32
4.6 Crashes by day of week.....	34
4.7 Spatial location of crashes	35

5. FACTORS CONTRIBUTING TO CRASHES

5.1 Introduction	37
5.2 Trends.....	38
5.3 Alcohol and road fatalities	38
5.4 Speed as a contributing factor to fatalities	41
5.5 Fatigue as a contributing factor	42
5.6 Seat belt usage in fatal crashes	43

APPENDIX 1 GLOSSARY.....	A1-1
---------------------------------	-------------

APPENDIX 2 KEY SUMMARY TABLES.....	A2- 1
---	--------------

INTRODUCTION

Background to the report

This report presents an overview of reported road traffic crashes in Queensland for the year ended 31 December 2000 in the context of the previous five years.

The information in this bulletin is based on data contained in the Queensland Road Crash Information System maintained by Queensland Transport's Land Transport & Safety Division. Additional data supplied by the Queensland Government Chemical Laboratory is used for the analysis of alcohol involvement in road crashes, in particular those involving a fatality. Validation and enhancement of the raw data which originates from the Queensland Police Service Traffic Incident Report System (TIRS) is completed by the Road Crash Database Group. This group provides a statistical service for the Land Transport & Safety Division and is a unit located within the Government Statistician's Office, Queensland Treasury Department.

In 1991, a number of major changes occurred concerning road crash data collection in Queensland, which impact upon the figures in this report. These changes were:

- from 1 April 1991: implementation of the Queensland Road Crash Information System by Queensland Transport. Prior to that date all road traffic crash data on the system had been coded by the Australian Bureau of Statistics (ABS) and distributed to Queensland Transport;
- from 1 July 1991: transfer of the official source for Queensland road traffic crash statistics from the ABS to Queensland Transport;
- from 1 October 1991: introduction of a new Queensland Police Service TIRS and computerised data entry system;
- from 1 December 1991: increase of the minimum damage cost of a reportable road crash (under Section 31 of the Queensland Traffic Act) from greater than \$1,000 to greater than \$2,500.

During 1992 further modifications were made to the Queensland Road Crash Information System. Also the criterion for the inclusion of a "property damage only" crash in the system was altered in line with the then Queensland Traffic Act to include any crash where the damage to vehicles was greater than \$2500 or towed away. On 1 December 1999, with the implementation of the Australian Road Rules in Queensland, this was again altered to include crashes where the damage was greater than \$2500 to property other than vehicles or at least one vehicle was towed away.

All crashes and casualties reported in this bulletin are dated in terms of the actual crash dates. Because of this and the fact that some non-fatal crashes may take 12 months or longer for validation, crash data for prior years will contain a percentage of changed data as late reports continue to be entered.

Figures presented in this report are based on the crashes validated in the Queensland Road Crash Information System at 31 March 2001.

Main features of road traffic crashes in Queensland 2000

- Queensland's road toll for 2000 was 318 fatalities. This was four fatalities (or one per cent) more than for 1999. The 2000 toll was 41 fatalities (or 11 per cent) lower than the previous five-year average of 359.
- In comparison with Queensland's one per cent increase, the Australian road toll increased by three per cent when compared with the previous year. The Australian toll for 2000 was 1822, an increase of 57 fatalities on the 1999 toll. Queensland's 8.9 road fatalities per 100,000 population was the second lowest of any Australian state with only Victoria being lower at 8.5. The Queensland rate was also below the national figure of 9.5 fatalities per 100,000 population.
- The over-represented road user groups continue to be young adults though these have decreased during the course of 2000. Road users aged between 17 and 20 years experienced fatality rates per 100,000 persons of more than one and half times the average for Queensland. Also road users aged 21 to 24 and 25 to 29 were over-represented with a similar rate per 100,000 persons.
- The older person fatalities were also over-represented in 2000. Road users aged 70 and over had fatality rates per 100,000 persons of more than twice the Queensland average.
- Based on police opinion of the cause of traffic crashes, as in previous years, disregard for traffic rules was the largest contributor (34 per cent of fatal crashes and 39 per cent of all reported crashes). At 34 per cent, alcohol/drugs was the second largest contributor to fatal crashes.
- Although speed was a contributing factor in five per cent of all reported crashes, it was judged to contribute to 17 per cent of fatal crashes for which it was the fifth most often cited contributing factor.
- Of the 44 fatal pedestrians in 2000, 23 (or 58 per cent) were killed whilst attempting to cross a road with the majority of these occurring where there was no traffic control.
- In regard to the 19632 road crashes on Queensland roads in 2000, by far the majority (12980 or 66 per cent) were multi-vehicle crashes.
- The majority (58 per cent) of single vehicle fatal crashes in 2000 involved vehicles hitting objects. The actual number of "hit object" crashes is an increase when compared to 1999.
- During 2000 the highest number of fatal crashes occurred on Friday or Saturday. Almost 35 per cent of fatal crashes occurred on these days. This was also reflected in all crashes where these two days equated to 31 per cent of all crashes.
- Forty-two percent of all crashes occurred within the greater Brisbane area (Brisbane City and Brisbane Statistical Division) with the rest occurring equally within provincial cities and rural Queensland. For fatal crashes, 49 per cent occurred in rural Queensland.

Road Crash Database

Road crash data plays a major role in the road safety planning and action of major agencies in Queensland and major developments have occurred in its use in recent years.

Queensland Transport provides a range of analysis services using the road crash data. As well as the present report, road crash data is used to provide crash profile reports, on request, on specific crash categories. As well, crash data is used to evaluate the effectiveness of all major countermeasures in Queensland (see Chapter 1 of this report) so as to influence program development.

The Department of Main Roads takes core data from the road crash data system operated by Queensland Transport and adds further site information to enable better planning for road safety engineering.

1. ROAD TOLL IN CONTEXT

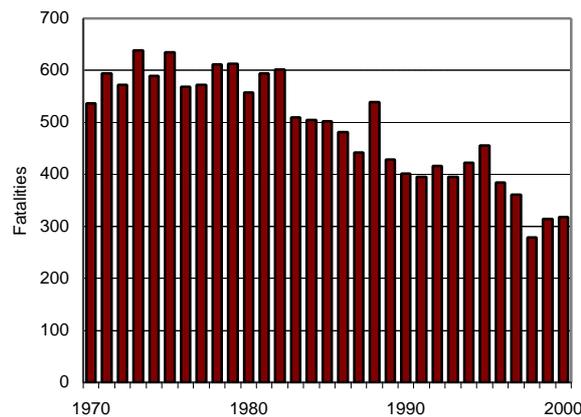
In this section, road traffic crashes for a range of severities in Queensland during 2000 are analysed. The analysis compares 2000 crashes (i) with past trends, (ii) with other states of Australia and (iii) in terms of population growth and economic activity. Finally, the key road safety initiatives of the 2000/2001 Queensland Road Safety Action Plan are evaluated and future actions to reduce the Queensland road toll are summarised.

1.1 Road fatality trends

A total of 318 people died on Queensland roads during 2000. This represents an increase of four fatalities (or one per cent) on the 1999 road toll. The 2000 road toll was 41 fatalities (or 11 per cent) lower than the average number of fatalities for the previous five years, of 359.

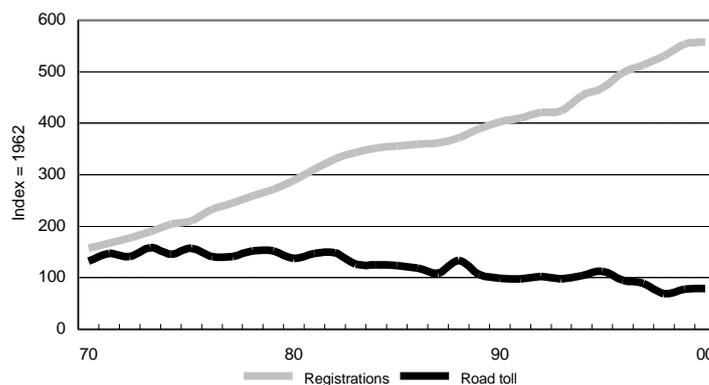
Figure 1.1 shows the longer-term trend in Queensland's road toll. Since the mid-1970s the road toll has been progressively declining. Particularly from 1988, the number of road fatalities has reverted to low levels not experienced since the early 1960s. Between 1989 and 1995 fatalities stabilised within the range of 456 (highest in 1995) and 395 (lowest in 1991). Since 1995, road tolls have declined with the 1998 toll being the lowest in Queensland since 1955. Whilst the 2000 toll was a slight increase over the historically low 1998, it was still lower than the toll in 1955.

Fig. 1.1: Annual road toll
Queensland 1970-2000



The general decline in the Queensland road toll has been achieved despite a steadily rising population and an escalation in the number of motor vehicles on register. Figure 1.2, which charts the road toll and motor vehicle registrations since 1970, shows the divergence of trends.

Fig. 1.2: Road toll and motor vehicle registration trends
Queensland 1970-2000



Fatalities in 2000 were 40 per cent below the 1970 toll of 527 fatalities, but vehicle registrations in 2000 were almost four times the 1970 level (see Table 1.1). From the early 1960s, annual road toll figures increased until the mid-1970s, after which a substantial decrease occurred. This decline was achieved despite a continuing strong increase in the number of motor vehicles registered.

A number of road safety initiatives introduced since 1970 have contributed to the reduction in road fatalities, particularly:

- compulsory seat belt wearing for occupants of cars (1972);
- reduction of illegal blood alcohol levels to 0.05 per cent (1982);
- introduction of Random Breath Testing (1988);
- introduction of Random Road Watch (1991);
- compulsory helmet wearing for bicyclists (1992);
- introduction of Speed Cameras (1997); and
- introduction of 50 km/h on local streets (1999)

As shown in Table 1.1, the fatality rates relative to both population and vehicle registration have declined significantly since 1970. Since that year the fatality rate based on population has declined by more than two-thirds and the rate based on number of vehicles on register has fallen over 80 per cent. Approximately 8.9 persons per 100,000 population died on Queensland roads in 2000 in contrast to 29.1 in 1970. Further, there were 1.3 road fatalities per 10,000 Queensland vehicles on register in 2000 in contrast to 7.7 in 1970.

Table 1.1: Fatality rates per head of population and vehicles registered
Queensland 1970 to 2000

Year	Road Toll	Population * ('000)	Fatality rate per 100,000 population	Vehicles on register ('000)	Fatality rate per 10,000 vehicles
1970	527	1812.8	29.1	686.1	7.7
1975	635	2072.3	30.6	917.0	6.9
1980	557	2301.7	24.2	1256.9	4.4
1985	502	2597.1	19.3	1546.1	3.2
1990	399	2932.2	13.6	1751.9	2.3
1995	456	3277.3	13.9	2038.9	2.2
2000	318	3566.4	8.9	2428.6	1.3

* ABS Cat. No. 3201.0

1.2 Road casualty trends

Casualties from road traffic crashes on Queensland roads totalled 15,173 in 2000. This represents an increase of 286 (or two per cent) on 1999. The increase was in all severity categories. The 2000 casualty figure was 98 (or one per cent) lower than the average number for the previous five years.

Table 1.2: Severity of road crash casualties
Queensland 1995-2000

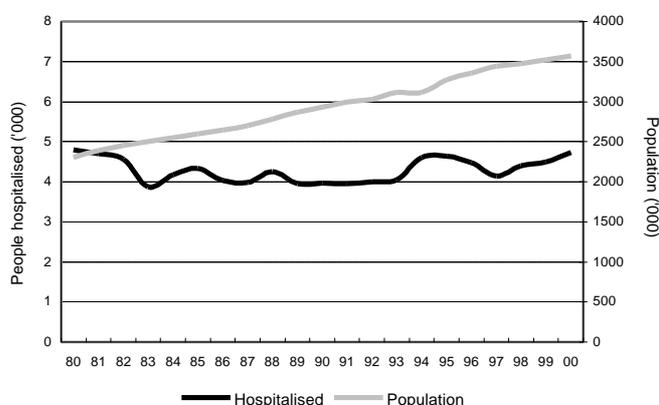
Severity	1995		1996		1997		1998		1999		2000	
	No.	%										
Fatal	456	3%	385	2%	360	2%	279	2%	314	2%	318	2%
Hospitalisation	4636	29%	4481	28%	4146	28%	4394	29%	4496	30%	4726	31%
Medical treatment required	6692	43%	6836	43%	6483	43%	6321	42%	6243	42%	6265	41%
Other injury	3932	25%	4131	26%	3928	26%	4008	27%	3834	26%	3864	25%
Total	15716	100%	15833	100%	14917	100%	15002	100%	14887	100%	15173	100%

As indicated in Table 1.2:

- the total number of road crash casualties in 2000 was slightly above that for 1999;
- road crash casualties in 2000 were more than three per cent lower than in 1995;
- 33 per cent of all road crash casualties in 2000 were either killed or admitted to hospital; and
- medical treatment injuries accounted for the greatest percentage of all casualties in 2000 (41 per cent).

Figure 1.3 charts the recent trend of the more severe road injuries (defined as persons requiring admission to hospital) compared with state population data.

Fig. 1.3: Road user hospitalisation and population trends Queensland 1980-2000



As Figure 1.3 shows, the number of persons hospitalised due to road crashes declined between 1980 and 1991, while the Queensland population increased each year. However hospitalisations increased from 1991 to 1996 and at a higher rate than that for population growth. This trend reversed from 1994 to 1997 but has reverted to an increase since 1998.

1.3 Trends in total reported crashes

There were 19,632 reported crashes on Queensland roads in 2000. This represents a slight rise on the 1999 figure and a two per cent decrease on the average for the previous five years.

Table 1.3 shows that the proportion of crashes in each severity category has remained relatively constant over 1995 to 2000. Over this period the fatality rate per 100 crashes has dropped from 1.9 in 1995 to 1.4 in 2000.

Table 1.3: Severity of road crashes Queensland 1995-2000

Severity	1995		1996		1997		1998		1999		2000	
	No.	%										
Fatal	408	2%	338	2%	321	2%	257	1%	273	1%	276	1%
Hospitalisation	3654	17%	3559	17%	3328	17%	3515	18%	3561	18%	3767	19%
Medical treatment required	4800	23%	4936	24%	4762	25%	4610	24%	4564	23%	4646	24%
Other injury	2800	13%	2872	14%	2697	14%	2757	14%	2623	13%	2682	14%
Property damage only	9602	45%	9209	44%	8235	43%	8419	43%	8503	44%	8261	42%
Total	21264	100%	20914	100%	19343	100%	19558	100%	19524	100%	19632	100%

Table 1.3 also shows that there were 276 fatal crashes in 2000, an increase of three (or one per cent) on 1999 and a decrease of 43 (or 14 per cent) on the average for the previous five years.

Table 1.4 presents data on road crashes for 1995 to 2000 by the level of vehicle damage.

**Table 1.4: Extent of vehicle damage in road crashes*
Queensland 1995-2000**

Overall damage	1995		1996		1997		1998		1999		2000	
	No.	%										
Vehicle towed away	17657	83%	17202	82%	15865	82%	15956	82%	16070	82%	16191	82%
Minor damage	2687	13%	2731	13%	2545	13%	2605	13%	2549	13%	2517	13%
No damage	605	3%	633	3%	628	3%	670	3%	625	3%	638	3%
Unit not a vehicle	252	1%	286	1%	251	1%	255	1%	229	1%	234	1%
Not stated	63	0%	62	0%	54	0%	72	0%	51	0%	52	0%
Total	21264	100%	20914	100%	19343	100%	19558	100%	19524	100%	19632	100%

* Based on the most severe vehicle damage in each crash

The table indicates that:

- tow-away crashes declined in 1996 and 1997 but have been rising since then;
- in over 80 per cent of reported road crashes, the damage is extensive enough for a vehicle to be towed away; and
- the proportion of damage to vehicles in road crashes has remained constant since 1995.

A further breakdown of the vehicle damage arising from reported crashes in 2000 is shown in Table 1.5.

**Table 1.5: Extent of vehicle property damage in road crashes*
Queensland 1999**

Damage	No.	%
Extensive, unrepairable	2630	13%
Major - towed away	5469	28%
Moderate - towed away	8091	41%
Moderate - vehicle driveable	1085	6%
Minor damage	1433	7%
No damage	638	3%
Unit not a vehicle	234	1%
Not stated	52	0%
Total	19632	100%

* Based on the most severe vehicle damage in each crash.

1.4 Queensland in relation to Australia

The Australian road toll in 2000 was 1822, an increase of 57 fatalities on the 1999 toll. Table 1.6 shows that changes to road tolls varied in Australian from those of 1999. The largest increases were in South Australia (up eight per cent) and Victoria (up six per cent) whilst the largest decrease occurred in Tasmania (down 19 per cent). Queensland had the second lowest per capita toll of all states only bettered by Victoria. Australian Capital Territory had a lower per capita toll at 5.8 fatalities per 100,000 population.

As indicated previously, Queensland's 8.9 road fatalities per 100,000 population and 1.3 road fatalities per 10,000 motor vehicles on register were both below the Australian average rates of 9.5 and 1.5 respectively.

**Table 1.6: Road toll in 2000 compared with 1999
States and territories of Australia**

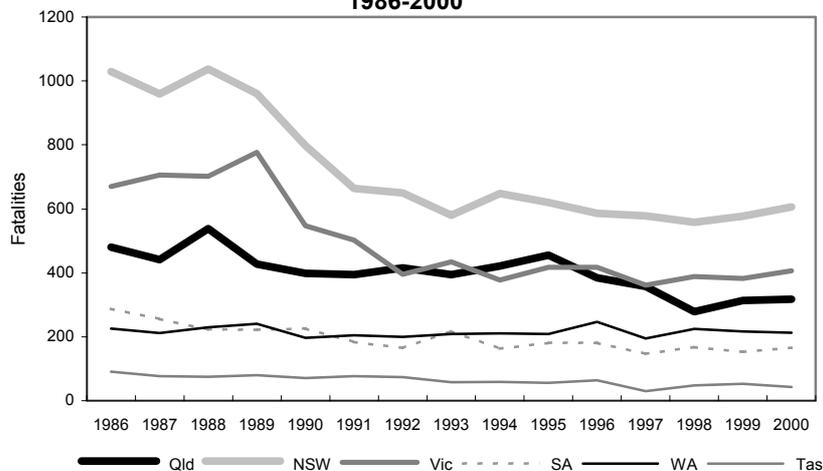
	Fatalities				Fatality rate	
	2000 No.	1999 No.	Variation No.	Variation per cent	per 100,000 population *	per 10,000 vehicles on register **
New South Wales	606	578	28	5%	9.4	1.6
Queensland	318	314	4	1%	8.9	1.3
Victoria	407	383	24	6%	8.5	1.3
Western Australia	213	217	-4	-2%	11.3	1.6
South Australia	166	153	13	8%	11.1	1.6
Tasmania	43	53	-10	-19%	9.1	1.3
Northern Territory	51	49	2	4%	26.1	5.0
Australian Capital Territory	18	18	0	0%	5.8	0.9
Australia	1822	1765	57	3%	9.5	1.5

* Based on ABS Cat. No. 3201.0

** Vehicle data supplied by relevant road authorities

To place this situation into a longer-term perspective, Figure 1.4 plots annual road fatalities by state for the period 1986 to 2000.

**Fig. 1.4: Annual road fatalities by state
1986-2000**



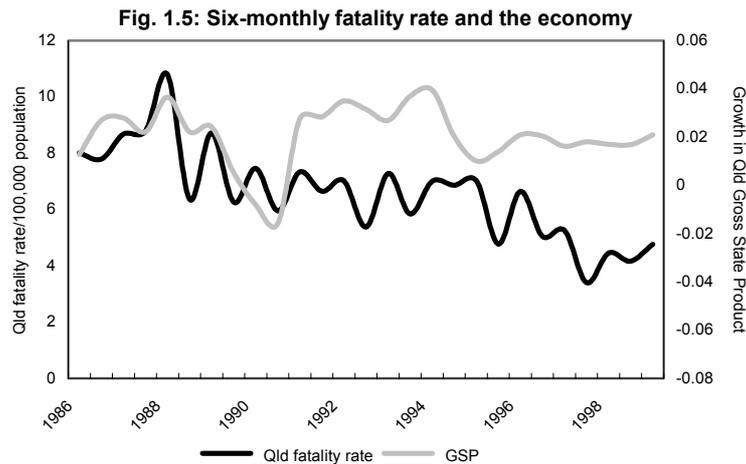
The figure shows that:

- after a period of relative stability, road fatalities in NSW and Victoria fell significantly from 1988 to 1992;
- the road toll in other jurisdictions remained relatively constant over the period; and
- the Queensland road toll has been declining markedly in comparison with the other states since 1995.

1.5 Factors behind the road toll

There is strong evidence that much of Queensland's road toll performance in both the longer 1986 to 1997 and shorter (since 1998) term can be explained by the interaction between the level of traffic activity (crash risk) and traffic safety management (safety measures carried out either by government, as in the Queensland Road Safety Strategy, or others – vehicle manufacturers, individual road users, and so on).

Figure 1.5 illustrates both the longer and shorter term points by comparing Queensland road fatalities with a measure of community (and hence traffic) activity, the Queensland Gross State Product.



Road toll and the economy

Concerning the longer term, Figure 1.5 shows that the road toll since 1991 has been lower than for the same level of activity from 1986 to 1990. This suggests (and separate, more rigorous studies support) the concept that the 1990s toll decrease is due to the effect of the measures of the Queensland Road Safety Strategy introduced from 1991 onwards. To name but a few, these measures include compulsory bicycle helmets, Red Light Cameras, Random Road Watch and, in 1997, the implementation of Speed Cameras.

The year 2000, then, can be seen as a period in which the latest generation of road safety improvements (the Queensland Road Safety Action Plan) combined with a low risk environment. Previous results would suggest that these factors combined should lead to a restrained road toll and, as reported at the start of this chapter, this is the result which has occurred.

1.6 The major contributors to the 2000 fatal road toll

In this section, over 30 road crash descriptors, which are analysed in more detail in the following chapters, are ranked together in order of the contribution of each to the entire fatal road toll. By this means, major contributors to the road toll can be isolated for consideration independent of their usual categories.

Table 1.7 shows that of the seven highest-ranked factors involved in fatal road crashes in 2000, none involved the traditional risk factors of speed, alcohol and failure to wear seat belts. The highest ranking factors included such 'good conditions' as alcohol not involved, seat belt used, straight level road and daylight.

**Table 1.7: Fatal crash descriptors by size of contribution to fatal crashes:
per cent of crashes, units or persons involved
Queensland 2000**

Crash descriptor	% Total	Crash descriptor	% Total
Alcohol not involved	84%	Speed	26%
Seatbelt used	79%	17-24 years	22%
Non-intersection	78%	Seatbelt not used	21%
Weekday	69%	Alcohol involvement	16%
Cars and variants	66%	60 years and over	14%
25-59 years	62%	Heavy freight vehicles	13%
Daylight	59%	Brisbane City	11%
Built-up area	56%	Pedestrians	10%
Open road	54%	Uncontrolled intersections	9%
Disobeyed traffic rules	54%	Fatigue	9%
Multi-vehicle	52%	Motorcycle	7%
Single vehicle	48%	Rain/wet road	5%
After dark	41%	Vehicle defects	3%
Weekend	31%	Bicycles	1%
Age/inexperience	30%		

The high levels of these categories of crashes point to the influence of the road and travel environment on fatal crashes. Hence widespread as well as targeted safety programs may be more likely to achieve benefits through greater deterrence.

1.7 Proposed next steps

As discussed above, during the 1990s Queensland has been subject to a wide range of road safety risk factors including Australia's:

- most rapid population growth; and
- strongest economic performance.

However, as outlined above, the road toll has not increased to the extent expected (see Section 1.5). As also outlined this reflects the success of the road safety initiatives discussed above, including those implemented since the release of the 1993 Queensland Road Safety Strategy.

Despite the benefits of these programs, the road toll remains high. Following the success of the 1999/2000 Action Plan, the Queensland Government developed the 2000/2001 Queensland Road Safety Action Plan to enhance those measures which were proven to work and to introduce further new effective programs.

The 2000/2001 Queensland Road Safety Action Plan Top 10 actions in priority order are presented in Table 1.8.

Table 1.8: 2000/2001 Queensland Road Safety Action Plan - Top 10 actions in priority order

Action	Type of crash addressed	Coverage of road toll	Proven crash reductions	Value for money score	Target group
Enhanced speed management strategy	Speed-related crashes	Medium	Y	High	Drivers
Random Road Watch enforcement program	All crashes	High	Y	High	All road users
Improved Random Breath Testing	All crashes	High	Y	Medium	All road users
More effective sanctions and penalties	All crashes	Medium	Y	High	All road users
Road safety traffic engineering works	All crashes	Low	Y	Medium	All road users
Improved vehicle safety standards	All crashes	High	Y	Medium	Vehicle occupants
Increase wearing of seat belts	All crashes	Medium	Y	High	All vehicle occupants
Increase take-up of road safety ITS	All crashes				All road users
Conduct public education campaigns	All crashes	Low	Y	Medium	All road users
Maintenance of State Traffic Task Force	All crashes	Medium	Y	Medium	All road users

These initiatives have been prioritised on the basis of:

- the extent to which they target the total road toll;
- their ability to reduce crashes; and
- their value for money.

Once implemented, it is expected that the Top 10 initiatives alone will make significant further inroads into the state road toll.

2. CHARACTERISTICS OF ROAD USERS INVOLVED IN CRASHES

2.1 Introduction

Of the 318 road users killed on Queensland roads in 2000, 234 (or 74 per cent) were male and 84 (or 26 per cent) were female. This represents an increase of 10 males and a decrease of 4 females over the figures for 1999.

2.2 Trend

The long term trends in fatalities by age group and gender are shown in Table 2.1. This table shows that while there have been slight increase in fatalities, the five year average has fallen since 1990 in all age groups except 25 to 59 years.

Table 2.1: Annual trends in fatalities by age group and gender: Queensland 1991-2000

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
All fatalities										
0-11 years*	25	26	19	22	25	20	21	17	18	12
12-16 years	17	22	18	18	21	20	17	14	19	16
17-24 years	96	119	122	103	121	107	113	79	77	63
25-59 years	180	172	174	194	208	172	155	121	143	165
60 years+	77	77	63	85	81	66	54	48	57	62
Total	395	416	396	422	456	385	360	279	314	318
Female fatalities										
0-11 years*	7	10	9	8	12	8	5	4	8	4
12-16 years	5	5	9	6	8	5	3	6	7	4
17-24 years	24	32	25	29	29	19	39	18	17	13
25-59 years	49	47	40	46	63	55	41	36	36	37
60 years+	34	33	23	38	32	30	21	17	20	26
Total	119	127	106	127	144	117	109	81	88	84
Male fatalities										
0-11 years*	18	16	10	14	13	12	16	12	8	8
12-16 years	12	17	9	12	13	15	14	8	12	12
17-24 years	72	87	97	74	92	88	74	61	60	50
25-59 years	131	125	134	148	145	117	114	85	107	128
60 years+	43	44	40	47	49	36	33	31	37	36
Total	276	289	290	295	312	268	251	197	224	234

* includes fatalities of unknown gender

Table 2.2 provides more detailed data concerning persons killed during 2000 by gender and age group.

**Table 2.2: Age and sex of fatalities
Queensland 2000**

Age group	Male	Female	Total	Proportion of road toll**	Proportion of population**	Fatalities per 10,000 persons*
0 - 4 years***	3	4	7	2%	7%	2.93
5 - 11 years	5	0	5	2%	10%	1.48
12 - 16 years	12	4	16	5%	7%	6.53
17 - 20 years	23	8	31	10%	6%	15.44
21 - 24 years	27	5	32	10%	7%	14.38
25 - 29 years	28	11	39	12%	8%	14.88
30 - 39 years	51	8	59	19%	16%	11.29
40 - 49 years	27	11	38	12%	14%	7.88
50 - 59 years	22	7	29	9%	10%	8.60
60 - 69 years	9	7	16	5%	7%	6.54
70 - 79 years	15	14	29	9%	5%	16.23
80 years & over	12	5	17	5%	2%	20.59
Total	234	84	318	100%	100%	9.48

* ABS Cat. No. 3201.0

** Figures in this column have been rounded

*** Includes fatalities of unknown gender

The data above indicates that:

- male fatalities were more than twice the number of females killed in road crashes;
- the largest over-represented road user age groups are the older road users. Road users aged 80 years and over recorded a fatality rate of more than twice the state average;
- young adult road users aged 17 to 24 years accounted for 20 per cent of the total fatalities but only 13 per cent of the population. Fatalities in this group decreased from 77 in 1999 to 63 in 2000. The 17 to 20 years age group decreased significantly from 15 per cent in 1999 to 10 per cent in 2000; and
- in the 17 to 24 years age group, males made up 79 percent of the total fatalities (up from 78 per cent in 1999), while females made up 26 percent of total fatalities (up from 25 per cent in 1998) in the 17 to 20 years age group.

Table 2.3 provides comparative information on fatality numbers by gender and age groups between 2000 and 1999.

**Table 2.3: Age and sex of fatalities
Queensland 2000 compared to 1999**

Age group	Male			Female		
	2000	1999	Variation	2000	1999	Variation
0 - 4 years	3	5	-40%	4	7	-43%
5 - 11 years	5	3	67%	0	1	-100%
12 - 16 years	12	12	0%	4	7	-43%
17 - 20 years	23	37	-38%	8	12	-33%
21 - 24 years	27	23	17%	5	5	0%
25 - 29 years	28	24	17%	11	12	-8%
30 - 39 years	51	45	13%	8	12	-33%
40 - 49 years	27	25	8%	11	5	120%
50 - 59 years	22	13	69%	7	7	0%
60 - 69 years	9	18	-50%	7	7	0%
70 - 79 years	15	12	25%	14	10	40%
80 years and over	12	7	71%	5	3	67%
Total	234	224	4%	84	88	-5%

Table 2.3 indicates that, compared with 1999:

- the number of male road user fatalities increased by 4 per cent from 224 to 234 in 2000. Fatalities for females decreased five per cent from 88 to 84;
- the largest percentage decrease of male age groups occurred in fatalities aged 60 to 69 years, (a decrease of 50 per cent from 18 to 9);
- the largest percentage decrease for any female age group occurred in the 5 to 11 years age group, where fatalities decreased by 100 per cent (from one to zero) compared with 1999. Fatalities in the 0 to 4 years age group and 12 to 16 years age group decreased by 43 per cent from 7 in 1999 to four in 2000; and
- in contrast to 1999, the largest percentage increases in male fatalities occurred in the 80 years and over age group (from seven to 12). The largest percentage increase in female fatalities occurred in the 40 to 49 years and 80 years and over age groups, by 120 and 67 per cent respectively.

Table 2.4 presents data concerning fatalities by road user type over the period 1995 to 2000.

**Table 2.4: Fatalities by road user type
Queensland 1995-2000**

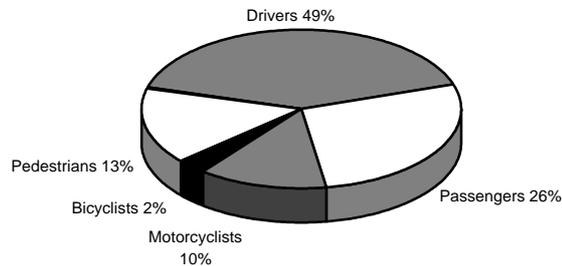
Road user type	1995		1996		1997		1998		1999		2000	
	No.	%										
Drivers	180	39%	174	45%	158	44%	121	43%	127	40%	157	49%
Passengers	119	26%	105	27%	88	24%	75	27%	87	28%	82	26%
Motorcyclists	54	12%	41	11%	43	12%	25	9%	41	13%	33	10%
Bicyclists	10	2%	10	3%	12	3%	9	3%	9	3%	6	2%
Pedestrians	92	20%	55	14%	59	16%	48	17%	49	16%	40	13%
Other	1	0%	0	0%	0	0%	1	0%	1	0%	0	0%
Total	456	100%	385	100%	360	100%	279	100%	314	100%	318	100%

It can be seen from the table that:

- the 318 fatalities in 2000 represent a 11 per cent decrease on the average of the previous five years of 359 fatalities;
- on average over the past six years, vehicle drivers made up 43 per cent of those killed in each year;
- passengers were the next largest group with an average of 26 per cent of all fatalities;
- pedestrian fatalities in 2000 showed a decrease of 18 per cent over 1999;
- there was a 24 per cent increase of driver fatalities in 2000 compared with 1999; and
- the proportion of fatalities made up by each user group has been similar in most years from 1995 to 2000.

Figure 2.1 shows the proportion of the 2000 road toll represented by each road user type.

Fig 2.1: Road toll by road user type Queensland 1999



The injury severity category “admitted to hospital” indicates a severe injury from a traffic crash and is second to “fatal” as the highest severity level recorded by police. Data on persons involved in a road crash and admitted to hospital over the period 1995 to 2000 is presented in Table 2.5, classified by type of road user.

Table 2.5: Hospitalised casualties by road user type Queensland 1995-2000

Road user type	1995		1996		1997		1998		1999		2000	
	No.	%										
Drivers	2088	45%	1928	43%	1841	44%	1996	45%	2097	47%	2231	47%
Passengers	1294	28%	1273	28%	1131	27%	1172	27%	1176	27%	1274	27%
Motorcyclists	598	13%	606	14%	546	13%	589	13%	525	12%	518	11%
Bicyclists	211	5%	259	6%	253	6%	240	5%	238	5%	277	6%
Pedestrians	445	10%	411	9%	373	9%	393	9%	380	9%	421	9%
Other	0	0%	4	0%	2	0%	3	0%	21	0%	4	0%
Total	4636	100%	4481	100%	4146	100%	4393	100%	4437	100%	4725	100%

Table 2.5 shows that:

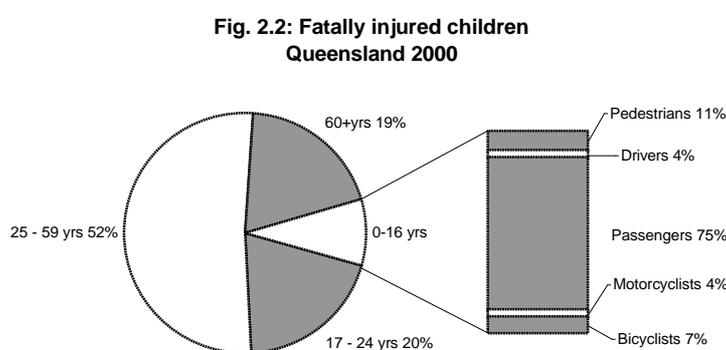
- when compared to the previous five-year average, the number of road users admitted to hospital as a result of a road crash has increased by seven per cent;
- the number of hospitalised drivers increased by six per cent from 2,097 in 1999 to 2,231 in 2000;
- in 2000, passengers hospitalised made up 27 per cent of the total, which is consistent with the previous five-year average proportion of the total;
- over the past six years motorcyclists consistently averaged around 13 per cent of the hospitalised casualties;

2.3 Children

The majority of fatalities among children aged up to 16 years in 2000 involved crashes between intersections (96 per cent), 73 per cent in 100km/h zones and 65 per cent during daylight hours. Compared with all fatalities in 2000, fatalities among children aged up to 16 years involved proportionally three times as many bicycles and were more likely to involve a wet road surface as a cause (202 per cent more).

Twenty-eight children aged up to 16 years were fatally injured in 2000, accounting for nine per cent of the state's road fatalities. The number killed in 2000 was lower than in 1999 (37). As children made up of one-quarter of the state's population, they were under represented in road fatalities.

Figure 2.2 and Table 2.6 provide details of fatalities of children grouped by road user type.



**Table 2.6: Child fatalities by road user type and age group
Queensland 2000**

Age group	Drivers	Passengers	Motorcyclists	Bicyclists	Pedestrians	Total
0 - 4 years	0	6	0	0	1	7
5 - 11 years	0	4	0	0	1	5
12 - 16 years	1	11	1	2	1	16
Total	1	21	1	2	3	28

The data shows that:

- 75 per cent of the children killed on Queensland roads in 2000 were passengers;
- there were three pedestrian fatalities for young children in 2000, representing 11 per cent of all children killed. This was a decrease from 1999 when five children pedestrians were killed, representing 14 per cent of the 1999 child fatalities; and
- 57 per cent of the child fatalities were of secondary school age (12 to 16 years). Sixty-nine per cent of these were passengers.

Table 2.7 compares the level of seat belt wearing of child fatalities during 2000 by age group to that of all vehicle occupant fatalities.

**Table 2.7: Non-seat belt wearing of child vehicle occupant fatalities
Queensland 2000**

Age group	Seat belt not worn	Total vehicle occupants killed *	Proportion of occupants unrestrained
0 - 4 years	2	6	33%
5 - 11 years	3	4	75%
12 - 16 years	4	8	50%
Total children	9	18	50%
All vehicle occupants	58	173	34%

* Where restraint use could be determined

The above data indicates that, in 2000, the proportion of child fatalities unrestrained (50 per cent) was above that for all road fatalities unrestrained (34 per cent).

The percentage of unrestrained vehicle occupants (regardless of age) has increased when compared with 1999 (from 32 per cent to 34 per cent). In 2000, of the 18 child vehicle occupant fatalities, nine were unrestrained compared with seven in 1999.

Table 2.8 shows the time of day when children were killed on Queensland roads in 2000.

**Table 2.8: Child road user fatalities by time of day
Queensland 2000**

Age group	Midnight to 6 am	6 am to 8 am	8 am to 2 pm	2 pm to 4 pm	4 pm to 6 pm	6 pm to midnight	Total
0 - 4 years	1	0	2	0	2	2	7
5 - 11 years	0	2	1	2	0	0	5
12 - 16 years	4	2	5	1	2	2	16
Total Children	5	4	8	3	4	4	28

The table shows that:

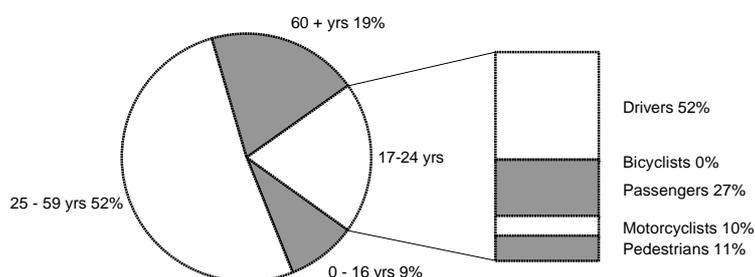
- 39 per cent of child fatalities in 2000 occurred between 8 am and 4pm;
- four (14 per cent) of the fatally injured children were involved in crashes occurring between 6pm and midnight; and
- nine (32 per cent) of the child fatalities died as a result of crashes occurring after dark.

2.4 Young adults

The majority of fatalities among young adults (that is, those aged between 17 and 24 years) in 2000 involved vehicles moving straight ahead (86 per cent) with 78 per cent occurring between intersections and 63 per cent during the working week. Seventy per cent of units involved were cars whilst 56 per cent of crashes were single vehicle accidents. Compared with all fatalities in 2000, fatalities among young adults occurred proportionally more often at roundabouts (55 per cent more), involving speed (45 per cent more) and occurring after dark (42 per cent more).

In Queensland, road crashes are a major cause of death for young adults (Australian Bureau of Statistics Cat. No. 3303.0). Young adults made up 63 of those killed on Queensland roads in 2000, this number representing 20 per cent of the year's total fatalities. This group was over-represented in road traffic fatalities as it makes up only 13 per cent of the total population of Queensland.

**Fig. 2.3: Fatally injured young adults
Queensland 2000**



The road user type of young adult fatalities is presented in Table 2.9. The table is divided into the two principal age groups; 17 to 20 years and 21 to 24 years.

**Table 2.9: Young adult fatalities by road user type and age group
Queensland 2000**

Age group	Drivers	Passengers	Motorcyclists	Bicyclists	Pedestrians	Total
17 - 20 years	19	6	2	0	4	31
21 - 24 years	14	11	4	0	3	32
Total	33	17	6	0	7	63

Table 2.9 indicates that:

- in 2000, 31 young adult fatalities (49 per cent) were aged 17 to 20 years. This is a decrease on the 1999 proportion of 63 per cent;
- 50 of the young adults killed in road crashes (79 per cent) were vehicle occupants, with the majority of those being drivers; and
- pedestrian fatalities, at seven, among young adults have dropped 22 per cent since 1999.

Table 2.10 shows that, where restraint use was known, 27 per cent of young adult vehicle occupant fatalities were unrestrained in 2000. This is an decrease on 1999 when this proportion was 38 per cent, and is below all vehicle occupants fatality rate (34 per cent).

**Table 2.10: Non - seat belt wearing of young adult vehicle occupant fatalities
Queensland 2000**

Age group	Seat belt not worn	Total vehicle occupants killed *	Proportion of vehicle occupants unrestrained
17 - 20 years	5	20	25%
21 - 24 years	4	13	31%
Total young adults	9	33	27%
All vehicle occupants	58	173	34%

* Where restraint use could be determined

Table 2.11 shows that the alcohol involvement of young adults in fatal crashes was below that for all drivers and riders. In 2000, 24 per cent of young adult fatalities tested for alcohol returned blood alcohol levels of 0.05 per cent or greater, below the figure for all road users (28 per cent).

**Table 2.11: Alcohol involvement of young adult driver and rider fatalities
Queensland 2000**

Age group	Tested	BAC 0.05% or greater	Proportion
17 - 20 years	18	5	28%
21 - 24 years	16	3	19%
Total young adults	34	8	24%
All drivers and riders	165	46	28%

Compared with 1999, proportional alcohol involvement amongst young adults increased by nine per cent in 2000. The total number of young adults with alcohol involvement rose by 14 per cent compared to 1999.

**Table 2.12: Young adult road user fatalities by day of week
Queensland 2000**

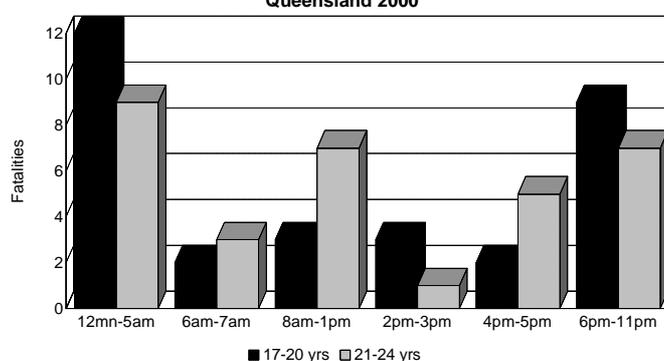
Age group	Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	Total
17 - 20 years	3	1	2	3	7	7	8	31
21 - 24 years	7	5	3	2	3	6	6	32
Total young adults	10	6	5	5	10	13	14	63

Analysis by the day of the week on which crashes occurred reveals Thursday, Friday, Saturday and Sunday to be high-risk periods for young adult road users, as shown in Table 2.12.

The table indicates that of the 63 young adult road users killed in 2000, 37 (or 59 per cent) died on a Friday, Saturday or Sunday, down slightly from 63 percent in 1999.

Figure 2.4 illustrates that 16 (or 25 per cent) of the 63 young adult fatalities were killed between 6pm and midnight, and a further 21 (33 per cent) were killed between midnight and 6 am, making those the highest risk times for young adults.

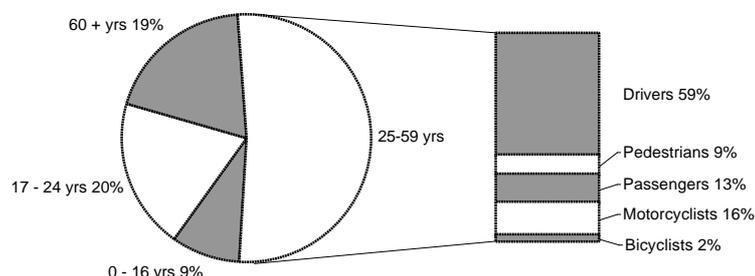
**Fig. 2.4: Young adult road user fatalities by time of day
Queensland 2000**



2.5 Mature age road users

The majority of fatalities among mature age road users (that is, those aged 25 to 59 years) in 2000 involved crashes between intersections (83 per cent) with 68 per cent occurring during the working week and 56 per cent in daylight. Sixty-two per cent of units involved were cars whilst 49 per cent of crashes occurred in 100 km/h zones. Compared with all fatalities in 2000, fatalities among mature age road users were more likely to occur in 110 km/h zones (44 per cent) or involve a motorcycle (41 per cent more likely). In 2000 there were 165 mature age road fatalities, which accounted for 52 per cent of Queensland's road toll, similar to 1999. Within the mature age group, road users aged 40 to 49 years and 50 to 59 years were under represented in fatal road crashes. These groups comprised 14 and 10 per cent respectively of the population in 2000, but made 12 and nine per cent of those killed on the roads (see Table 2.2 page 10).

**Fig. 2.5: Mature age road user fatalities
Queensland 2000**



Mature age road user fatalities in the four main age groups are shown in Table 2.13.

**Table 2.13: Mature age road user fatalities by type and age group
Queensland 2000**

Age group	Drivers	Passengers	Motorcyclists	Bicyclists	Pedestrians	Total
25 - 29 years	24	7	6	1	1	39
30 - 39 years	34	7	13	1	4	59
40 - 49 years	20	6	5	1	6	38
50 - 59 years	20	2	2	1	4	29
Total	98	22	26	4	15	165

Data presented in Table 2.13 and Figure 2.5 indicate that:

- 73 per cent of the mature age road users killed in 2000 were vehicle occupants;
- 98 (59 per cent) of the mature age road users were drivers; and
- motorcycle fatalities decreased by 13 per cent from 30 in 1999 to 26 in 2000.

Table 2.14 shows that, where restraint use was known, mature age vehicle occupant fatalities have a failure to wear a seat belt rate of 38 per cent, which is four per cent higher than that for all road users.

**Table 2.14: Non-seat belt wearing of mature age vehicle occupant fatalities
Queensland 2000**

Age group	Seat belt not worn	Total vehicle occupants killed *	Proportion of occupants unrestrained
25 - 29 years	12	21	57%
30 - 39 years	12	30	40%
40 - 49 years	6	19	32%
50 - 59 years	4	20	20%
Total mature age	34	90	38%
All vehicle occupants	58	173	34%

* Where restraint use could be determined

The data in Table 2.14 indicate that vehicle occupant fatalities aged 25 to 29 years had the lowest seat belt wearing rates of mature age groups, with 57 per cent unrestrained.

Table 2.15 presents data on alcohol involvement of mature age driver and rider fatalities in 2000.

**Table 2.15: Alcohol involvement of mature age driver and rider fatalities
Queensland 2000**

Age group	Tested	BAC 0.05% or greater	Proportion
25 - 29 years	24	9	38%
30 - 39 years	42	19	45%
40 - 49 years	22	7	32%
50 - 59 years	20	2	10%
Total mature age	108	37	34%
All drivers and motorcycle riders	165	46	28%

The table shows that:

- compared with 1999, proportional alcohol involvement amongst mature adults showed an increase;
- 34 per cent of mature age driver and rider fatalities in 2000 (37 of 108 tested) returned a BAC reading of 0.05 per cent or greater (the general adult legal drink driving limit). This was six percentage points above the proportion for all drivers and riders killed; and
- fatalities aged from 30 to 39 years had the highest incidence of illegal drink driving (45 per cent).

Table 2.16 shows the occurrence of mature age road user fatalities by day of the week.

**Table 2.16: Mature age road user fatalities by day of week
Queensland 2000**

Age group	Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	Total
25 - 29 years	7	3	5	7	4	4	9	39
30 - 39 years	15	5	4	3	8	13	11	59
40 - 49 years	2	8	6	4	6	7	5	38
50 - 59 years	3	4	4	4	5	5	4	29
Total Mature Age	27	20	19	18	23	29	29	165

It can be seen from the data above that fatalities were spread throughout the week, with peaks on Friday and Saturday (both 18 per cent), and the lowest rate on Wednesday (11 per cent).

2.6 Older road users

The majority of fatalities among older road users (that is, those aged 60 years and over) in 2000 occurred during daylight hours (83 per cent), 81 per cent during the working week and involving vehicles moving straight ahead (74 per cent). Compared with all fatalities in 2000, fatalities among older road users were 159 per cent more likely to occur at Give Way/Stop signs, at operating traffic lights (154 per cent) and 87 per cent more likely to occur at intersections.

Sixty-two road users aged 60 years and over were killed on Queensland roads in 2000, comprising 19 per cent of the road toll. This is five (or nine per cent) more fatalities for this age group than in 1999.

Figure 2.6 presents the distribution of older road user fatalities by road user type.

**Fig. 2.6: Older road user fatalities
Queensland 2000**

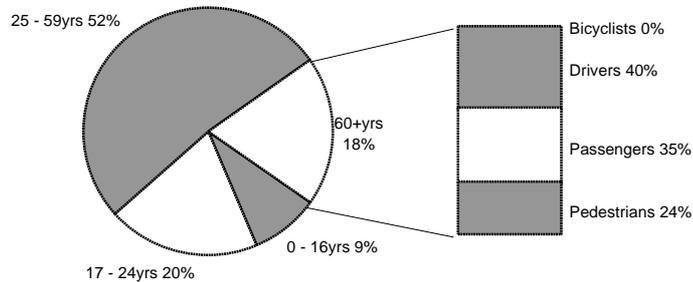


Table 2.17 groups the data by road user type and age.

**Table 2.17: Older road user fatalities by type and age group
Queensland 2000**

Age group	Drivers	Passengers	Motorcyclists	Bicyclists	Pedestrians	Total
60 - 69 years	6	8	0	0	2	16
70 - 79 years	11	9	0	0	9	29
80 years and over	8	5	0	0	4	17
Total	25	22	0	0	15	62

From Table 2.17, it can be seen that:

- the majority of older road users killed were vehicle occupants (76 per cent);
- 74 per cent of older drivers killed were aged 70 years and over;
- there were 22 passenger fatalities in 2000, 16 (or 267 per cent) more than 1999; and
- there were 15 pedestrian fatalities in 2000, a 17 per cent decrease on the 1999 level. Almost 90 per cent of these fatalities were aged 70 years and over.

Table 2.18 (and previous annual crash reports) indicate that older vehicle occupants fatally injured are more likely to be wearing seat belts when compared with other age groups. For vehicle occupant fatalities, 19 per cent of older road users were unrestrained, compared with 34 per cent of all vehicle occupants.

**Table 2.18: Non - seat belt wearing of older vehicle occupant fatalities
Queensland 2000**

Age group	Seat belt not worn	Total vehicle occupants killed *	Proportion of occupants unrestrained
60 - 69 years	1	10	10%
70 - 79 years	3	11	27%
80 years +	2	11	18%
Total children	6	32	19%
All vehicle occupants	58	173	34%

* Where restraint use could be determined

Table 2.19 provides details of responsibility for fatal crashes involving older road users, as indicated by the reporting police officer.

**Table 2.19: Responsibility for fatal crashes involving older drivers or pedestrians
Queensland 2000**

Age group	Drivers			Pedestrians		
	Responsible	Total	%	Responsible	Total	%
60 - 69 years	9	19	47%	1	2	50%
70 - 79 years	16	21	76%	6	11	55%
80 years and over	9	11	82%	3	4	75%
Total older age group	34	51	67%	10	17	59%
All age groups	215	372	58%	36	48	75%

Table 2.19 shows that:

- older drivers were believed to be responsible for 67 per cent of fatal crashes in which they were involved in 2000 in contrast to drivers generally, who were believed to be responsible for 58 per cent of fatal crashes in which they were involved. This remained constant for the older drivers also at 67 per cent in 1999;
- this allocated responsibility for drivers increases with age from 47 per cent in the 60 to 69 years group, to 82 per cent for the 80 years and over group; and
- older pedestrians were believed to be responsible for 59 per cent of fatal crashes in which they were involved in 2000. This is lower than the proportion of pedestrians responsible for fatal crashes across all age groups (75 per cent).

Table 2.20 shows the daily time periods during which fatal crashes involving older road users occurred in 2000.

**Table 2.20: Older road user fatalities by time of day
Queensland 2000**

Age group	6am - 8am	8am - 10am	10am - 12 noon	12 noon - 2pm	2pm - 4pm	4pm - 6pm	6pm - 6am	Total
60 - 69 years	2	3	2	1	3	2	3	16
70 - 79 years	1	4	4	6	3	5	6	29
80 years and over	2	2	2	3	2	3	3	17
Total older age group	5	9	8	10	8	10	12	62

The data show that:

- 73 per cent of older road user fatalities (45 out of 62) occurred between 8.00am and 6.00pm;
- 29 per cent of the older road user fatalities (18) occurred between 12.00pm and 4.00pm; and
- 19 per cent of the older road user fatalities (12) occurred between 6.00pm and 6.00am.

3. UNITS IN CRASHES

3.1 Introduction

There were 35,944 vehicles and other crash unit types involved in the 19,632 reported road traffic crashes on Queensland roads during 2000. This indicates a crash rate of 1.83 units per crash during 2000, while for the more severe crashes the number of units per crash was lower (fatal 1.66; hospitalization 1.72). Table 3.1 illustrates the involvement of the different unit types by the severity level of crashes in 2000.

**Table 3.1: Units involved in crashes by severity of crash
Queensland 2000**

Unit type	Fatal		Hospitalisation		All crashes	
	No.	%	No.	%	No.	%
Car	210	46%	3791	58%	24750	69%
4-wheel drive	37	8%	356	5%	1879	5%
Utility/van	56	12%	674	10%	4142	12%
Rigid truck	31	7%	167	3%	920	3%
Articulated truck	22	5%	103	2%	515	1%
Road Train/B-double	8	2%	23	0%	123	0%
Bus	5	1%	59	1%	299	1%
Motorcycle	34	7%	508	8%	1084	3%
Tractor	3	1%	35	1%	164	0%
Towed device	0	0%	3	0%	27	0%
Bicycle	6	1%	284	4%	801	2%
Pedestrian	44	10%	430	7%	924	3%
Animal - ridden	0	0%	5	0%	6	0%
Animal - stock *	0	0%	20	0%	160	0%
Animal - other *	0	0%	17	0%	77	0%
Railway stock	2	0%	1	0%	9	0%
Other	1	0%	6	0%	64	0%
Total units	459	100%	6482	100%	35944	100%

The data above indicates that:

- 69 per cent of units involved in all reported crashes were cars, whereas cars comprised 46 per cent of the units involved in fatal crashes;
- in fatal crashes, unprotected road users (motorcyclists, bicyclists and pedestrians) comprised 18 per cent of the units involved, whereas they comprised only eight per cent of units in all reported crashes; and
- the involvement of heavy freight vehicles (rigid, articulated and road trains/b-doubles) in fatal crashes was more than three times the involvement of these vehicles in all heavy vehicle crashes. These vehicles comprised 14 per cent of the units involved in fatal crashes in 2000, whereas they comprised four per cent of the units involved in all crashes.

Figure 3.1 illustrates the involvement of units in fatal crashes in 2000.

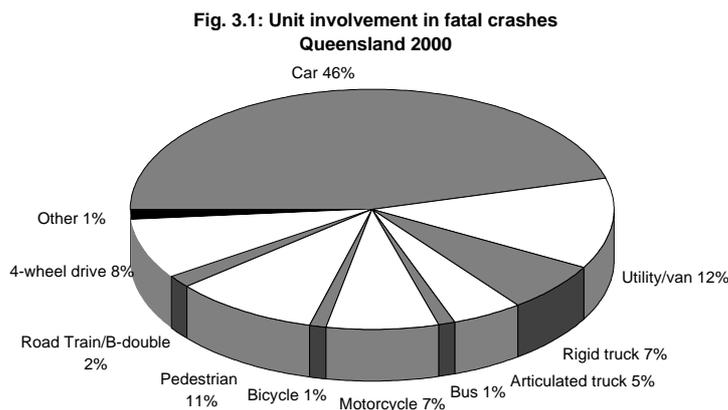


Table 3.2 lists the number of units involved in fatal crashes by unit type since 1995.

**Table 3.2: Units involved in fatal crashes by year
Queensland 1995-2000**

Type of vehicle	1995	1996	1997	1998	1999	2000
Car	347	292	286	209	229	210
Utility/van	107	84	78	75	73	37
4-wheel drive*	N/A	N/A	N/A	N/A	N/A	56
Rigid truck	28	24	24	17	17	31
Articulated truck	49	34	31	29	31	22
Roadtrain/B-double**	N/A	N/A	N/A	N/A	N/A	8
Bus	6	6	2	7	12	5
Motorcycle	57	44	44	25	44	34
Tractor	7	7	6	3	5	3
Towed device	0	1	0	1	1	0
Bicycle	10	11	12	10	10	6
Pedestrian	96	59	61	48	52	44
Animal - ridden	0	0	0	2	0	0
Animal - stock	2	2	5	3	1	0
Animal - other	1	1	0	2	0	0
Railway stock	4	4	3	4	0	2
Other	2	0	3	2	8	1
Total	716	569	555	437	483	459

* Was included in 'Car' prior to 2000

** Was included in 'Articulated truck' prior to 2000

The main trends indicated in Table 3.2 are:

- overall, the number of units involved in fatal crashes during 2000 was 17 per cent lower than the average of the previous five years;
- motorcycle and pedestrian involvement both showed decreases in 2000 over 1999. Pedestrian involvement in particular was noticeably down when compared to the five-year average;
- the involvement of motorcycles in fatal crashes decreased in 2000 when compared to 1999, and was 21 per cent lower than the average of the previous five years; and
- bus involvement had a 58 per cent decrease over 1999 and a decrease (24 per cent) when compared to the previous five-year average.

The trend of the involvement of the major vehicle types in fatal crashes since 1986 is illustrated in Figure 3.2.

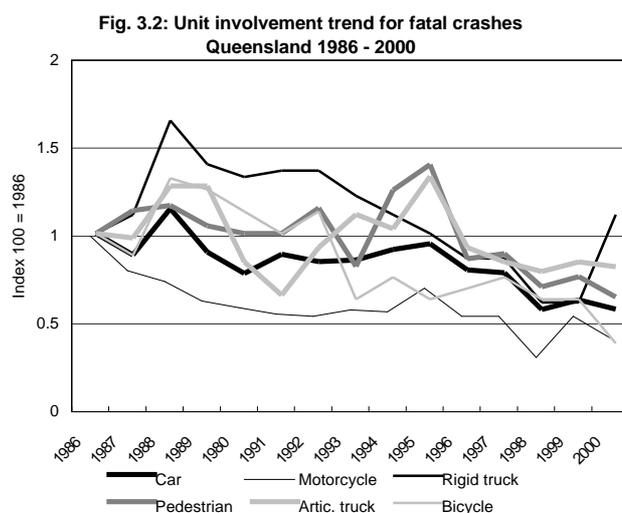


Figure 3.2 highlights the general downward trend of all units involved in fatal crashes from 1988 until 1999. In 2000, rigid truck involvement increased markedly but all other units show a decrease over 1999 levels.

3.2 Fatal crash involvement by unit type

Cars and variants

Fatal crash involvement of cars, utilities and panel vans have shown decreases in 2000 over the previous nine year averages, of 16 per cent and 32 per cent respectively (see Table 3.3). The majority of these crashes in 2000 involved vehicles between intersections (77 per cent), with 69 per cent occurring during the working week, 60 per cent in daylight and 55 percent on straight roads. Compared with all fatal crashes in 2000, fatal crashes involving cars occurred in similar proportions for all descriptors.

**Table 3.3: Annual trends in fatal crash involvement of cars and variants
Queensland 1991-2000**

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Car	325	310	313	335	347	292	286	209	229	210
Utility/van	75	89	72	85	107	84	78	75	73	56
4-wheel drive	N/A	37								

During 2000, 303 cars (including utilities, panel vans and 4-wheel drives) were involved in fatal crashes. Of the 303 cars, 194 (or 64 per cent) were considered “most at fault” by investigating police. Of the fatal crashes in which a car was considered most at fault, more than half (106 crashes) were single vehicle crashes. Overall, cars were considered the unit most at fault in 70 per cent of all fatal crashes.

An analysis of the relative involvement in fatal crashes of all types of cars in 2000 is provided in Table 3.4.

**Table 3.4: Comparison of fatal crash involvement for cars and variants
Queensland 2000**

Vehicle type	% of units in fatal crashes	% of total vehicle registrations	Fatal crash rate/10,000 vehicles
Car/Station wagon	46%	73%	1.2
Utility/van	8%	17%	1.3
Total cars	54%	91%	1.2

Heavy freight vehicles

Fatal crash involvement of heavy vehicles showed a significant increase in 2000. Overall, the involvement of rigid and articulated trucks showed a slight increase in 2000 over the previous nine-year average (up by 40 per cent and down by 36 per cent respectively) (see Table 3.5). The majority of these crashes occurred between intersections (90 per cent) and during the working week (74 per cent), with 67 per cent during daylight and 54 per cent on straight roads. Twenty-eight per cent of these crashes occurred within the Southern region. Compared with all fatal crashes in 2000, fatal crashes involving heavy vehicles were more likely to involve fatigue (66 per cent more) and occur less often at operating traffic lights (74 per cent less often).

Table 3.5: Annual trends in fatal crash involvement of heavy vehicles

Queensland 1991-2000										
	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Rigid Truck	38	38	34	31	28	24	24	17	17	31
Articulated Truck	24	34	41	38	49	34	31	29	31	22
Road train/Bdouble	N/A	8								

During 2000, 61 heavy freight vehicles (rigid and articulated trucks and road trains/bdoubles) were involved in fatal crashes. Of the 61 heavy freight vehicles, 16 (or 26 per cent) were considered most at fault by investigating police. Of those fatal crashes in which a heavy freight vehicle was considered most at fault, 63 per cent were single vehicle crashes. Overall, heavy freight vehicles were considered the unit most at fault in only six per cent of all fatal crashes. An analysis of the relative involvement in fatal crashes in 2000 of heavy freight vehicles compared with cars is provided in Table 3.6.

Table 3.6: Comparison of fatal crash involvement for cars and heavy freight vehicles

Queensland 2000			
Vehicle type	% of units in fatal crashes	% of total vehicle registrations	Fatal crash rate/10,000 vehicles
Total cars	58%	91%	1.2
Rigid trucks	7%	3%	4.0
Articulated trucks	5%	1%	17.5

The data indicates that in 2000 articulated trucks had a fatal crash rate per 10,000 registered vehicles of almost 15 times that for cars. Articulated trucks were involved in 17.5 fatal crashes per 10,000 trucks on register in 2000. The figure for cars was 1.2 fatal crashes per 10,000 cars registered. Rigid trucks had a total crash rate of 3.3 times that for cars.

Buses

Fatal crash involvement of buses has shown a relatively flat trend over the past ten years apart from peaks in 1991 and 1999 (see Table 3.7). Bus crashes in 2000 resulted in two bus occupants killed. The majority of fatal crashes involving buses in 2000 occurred during the working week (80 per cent), in daylight (60 per cent) and on straight roads (60 per cent).

Table 3.7: Annual trends in fatal crash involvement of buses

Queensland 1991-2000										
	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Bus	12	4	7	7	6	6	2	7	12	5

During 2000, 5 buses were involved in fatal crashes on Queensland roads. In three of these crashes, the bus was considered most at fault by investigating police, and two bus occupants was killed in those crashes. A comparison of the relative fatal crash involvement per 10,000

vehicles on register of buses compared with cars indicates a fatal crash rate for buses of over twice that of cars for 2000. Table 3.8 presents this comparison.

Table 3.8: Comparison of fatal crash involvement for cars and buses

Queensland 2000			
Vehicle type	% of units in fatal crashes	% of total vehicle registrations	Fatal crash rate/10,000 vehicles
Total cars	58%	91%	1.2
Buses	1%	1%	3.1

Motorcycles

The trend in the involvement of motorcycles in fatal crashes was relatively flat from 1991 to 2000, except for an increase in 1995 and decreases in 1998 and 2000 (see table 3.9). The majority of fatal motorcycle crashes in 2000 occurred during the working week (61 per cent), between intersections (58 per cent), during daylight hours (58 per cent) and on straight roads (52 per cent). Compared with all fatal crashes in 2000, fatal crashes involving motorcycles occurred proportionally more often at operating traffic lights (164 per cent more often) but less often involving fatigue (62 per cent less often).

Table 3.9: Annual trends in fatal crash involvement of motorcycles

Queensland 1991-2000										
	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Motorcycle	45	44	47	46	57	44	44	25	44	34

During 2000, 34 motorcycles were involved in fatal crashes, in which 30 motorcycle riders and three pillion passengers died. Twenty-four of these motorcycles (or 71 per cent of motorcycles involved) were considered most at fault by investigating police. Eighteen (or 75 per cent) of motorcycles considered most at fault were involved in single vehicle crashes. Overall, motorcycles were considered the unit most at fault in nine per cent of all fatal crashes.

Table 3.10 indicates that in 2000, motorcycles had a fatal crash involvement rate, based on vehicles registered, that was almost four times that for cars.

Table 3.10: Comparison of fatal crash involvement for cars and motorcycles

Queensland 2000			
Vehicle type	% of units in fatal crashes	% of total vehicle registrations	Fatal crash rate/10,000 vehicles
Total cars	58%	92%	1.2
Motorcycles	7%	3%	4.5

Cars comprised 58 per cent of units involved in fatal crashes, while motorcycles comprised seven per cent. However, based on vehicle registrations, motorcycles were involved in 4.5 fatal crashes per 10,000 registered motorcycles compared to the car fatal crash rate of 1.2 fatal crashes per 10,000 registered cars.

Bicycles

The trend in fatal bicycle crashes was relatively flat during 1991 and 1992, followed by a decline in 1993, with a flat trend since then. The majority of crashes in 2000 occurred during the working week (83 per cent), during daylight hours (83 per cent), between intersections (67 per cent) and on straight roads (67 per cent).

**Table 3.11: Annual trends in fatal crash involvement of bicycles
Queensland 1991-2000**

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Bicycle	16	18	10	12	10	11	12	10	10	6

In 2000, six bicycles were involved in fatal crashes on Queensland roads. In five of these fatal crashes (or 83 per cent), the cyclist was considered most at fault. Overall, bicycles were considered the unit most at fault in one per cent of all fatal crashes.

Pedestrians

The trend in pedestrian crashes was increasing up until 1995 and has been decreasing since (see Table 3.12). Pedestrian fatal crash involvement showed an 15 per cent decrease from 1999 and a 35 per cent decrease compared with the previous nine year average. The majority of crashes in 2000 occurred between intersections (75 per cent), on straight roads (73 per cent), during the working week (68 per cent) and during daylight hours (58 per cent).

**Table 3.12: Annual trends in fatal crash involvement of pedestrians
Queensland 1991-2000**

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Pedestrian	69	79	56	86	96	59	61	48	52	44

During 2000, 44 pedestrians were involved in fatal crashes including 40 pedestrian fatalities. As indicated in Table 3.13, 23 (or 58 per cent) of the pedestrian fatalities in 2000 occurred while the pedestrian was attempting to cross a road. Of these, 18 (or 78 per cent) were killed on roads with no traffic controls, while four were killed at traffic lights.

**Table 3.13: Attempted action of pedestrians killed in fatal crashes
Queensland 2000**

Attempted action	No. of fatalities	% involvement in fatal pedestrian crashes
Crossing carriageway - Traffic lights	4	10%
Crossing carriageway - Pedestrian Crossing	1	3%
Crossing carriageway - No traffic control	18	45%
Remain stationary	6	15%
Walk against traffic	3	8%
Walk with traffic	6	15%
Work on vehicle	1	3%
Other working	1	3%

Of the pedestrians involved in fatal crashes, 31 (or 70 per cent) were considered by police to be most at fault. Fifty-eight per cent of these most at fault pedestrians were crossing where no traffic control was present.

4. CHARACTERISTICS OF CRASHES

4.1 Introduction

Of the 19,632 road crashes reported in Queensland in 2000, by far the majority (12,980 or 66 per cent) were multi-vehicle crashes. Single vehicle crashes made up 6652 crashes, or 34 per cent of all crashes in 2000.

4.2 Comparative trends

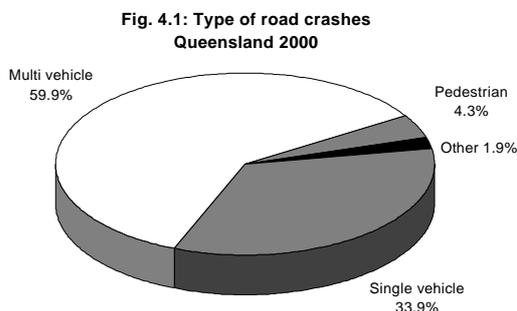
The long-term trends in the nature of fatal crashes are shown in Table 4.1. This table shows that, while there have been no dramatic changes in these trends over the past ten years, hit pedestrian and rear-end crashes showed decreases in 2000. Compared to 1999, overturned has recorded a significant increase of 48 per cent during 2000 in contrast to sideswipe fatal crashes with a decrease of 32 per cent.

Table 4.1: Annual trends in the nature of fatal crashes:
Queensland 1991-2000

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Hit object	85	82	101	93	105	93	95	80	65	79
Hit pedestrian	63	73	44	73	88	55	55	46	47	38
Head-on	53	67	55	62	70	46	48	23	47	47
Angle	69	53	71	60	50	60	54	44	36	34
Overtaken	46	39	53	35	47	45	25	24	27	40
Rear-end	15	17	7	11	16	10	8	8	12	6
Fall from vehicle	8	20	9	10	11	13	11	8	12	12
Sideswipe	15	9	7	10	10	9	16	11	19	13
Hit parked vehicle	1	1	2	6	7	4	3	6	5	6
Hit animal	3	2	7	4	3	3	5	6	1	0
Other	1	0	1	4	1	0	1	1	2	1

* Vehicle includes motor or pedal cycle

Figure 4.1 illustrates the proportion of each of the major road crash types for 2000.



The relative occurrence of single vehicle crashes increases as the crash severity increases. Of the 276 fatal crashes in 2000, 137 crashes (or 50 per cent) were single vehicle crashes, while multi-vehicle crashes accounted for 100 crashes (or 36 per cent).

Figure 4.2 shows how the nature of crashes changed in relation to the severity of the crash.

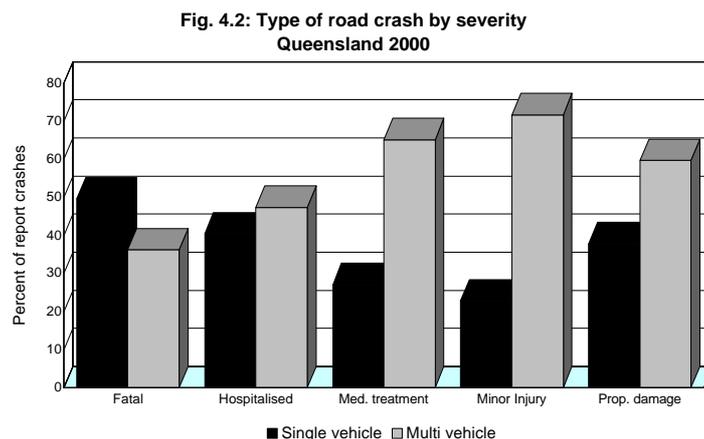


Table 4.2 provides a more detailed analysis of the nature of crashes in Queensland in 2000 grouped by the severity of crash.

**Table 4.2: Crashes by nature of crash and severity
Queensland 2000**

Nature of crash	Fatal		Hospitalisation		All crashes**	
	No.	%	No.	%	No.	%
Hit object	79	29%	905	24%	4287	22%
Head-on	47	17%	138	4%	413	2%
Overtaken	40	14%	384	10%	1343	7%
Hit pedestrian	38	14%	396	11%	848	4%
Angle	34	12%	1110	29%	6284	32%
Sideswipe	13	5%	160	4%	953	5%
Fall from vehicle *	12	4%	142	4%	297	2%
Hit parked vehicle	6	2%	92	2%	725	4%
Rear-end	6	2%	376	10%	4114	21%
Other	1	0%	25	1%	131	1%
Hit animal	0	0%	39	1%	237	1%
Total	276	100%	3767	100%	19632	100%

* Vehicle includes motor or pedal cycle

** Including casualty and property damage only

Table 4.2 indicates that in 2000:

- 79 fatal crashes (or 29 per cent of all fatal crashes) occurred as the result of a vehicle hitting an object, whilst 22 per cent of all crashes were of this nature;
- vehicles involved in head-on crashes (47 fatal crashes or 17 per cent of fatal crashes), and vehicles hitting a pedestrian (38 fatal crashes or 14 per cent of fatal crashes) were also markedly over-represented in fatal crashes compared with all reported crashes;
- the majority of hospitalisation crashes resulted from vehicles colliding at intersections, i.e. angle crashes (29 per cent), or colliding with an object, e.g. trees or power poles (24 per cent); and
- intersection collisions and rear end crashes, both multi-vehicle type crashes, made up over half (53 per cent) of all reported crashes.

4.3 Multi-vehicle crashes

The trend in fatal multi-vehicle crashes has been relatively stable over the period 1995 to 2000 and, in line with fatal crashes overall, numbers of fatal multi-vehicle crashes have trended downwards from 1995 to 2000. The majority of these crashes in 2000 occurred between Monday and Friday (77 per cent), in daylight (76 per cent) and at non-intersections (67 per cent). Compared with all fatal crashes in 2000, fatal multi-vehicle crashes occurred proportionally more often at Give Way/Stop signs (122 per cent more often), at operating traffic lights (74 per cent more often) and were 66 per cent more likely to result from disobeying traffic rules. Similarly, multi-vehicle fatal crashes were 76 per cent less likely to involve speed and 62 per cent less likely to involve fatigue.

In 2000, 100 fatal multi-vehicle crashes were reported. This figure is 16 per cent below the average for the last five years. Table 4.3 presents multi-vehicle fatal crash data for 1995 to 2000 by the nature of the crash.

**Table 4.3: Multi-vehicle fatal crashes by nature of crash
Queensland 1995-2000**

Nature of crash	1995		1996		1997		1998		1999		2000	
	No.	%	No.	%	No.	%	No.	%	No.	%	No.	%
Angle	50	34%	60	48%	54	43%	44	51%	36	32%	34	34%
Head-on	70	48%	46	37%	48	38%	23	27%	47	41%	47	47%
Rear-end	16	11%	10	8%	8	6%	8	9%	12	11%	6	6%
Sideswipe	10	7%	9	7%	16	13%	11	13%	19	17%	13	13%
Total	146	100%	125	100%	126	100%	86	100%	114	100%	100	100%

Table 4.3 indicates that:

- angle crashes represented 34 per cent of fatal multi-vehicle crashes in 2000, which is less than the 1995 to 1999 average of 42 per cent;
- head-on crashes represented 47 per cent of fatal multi-vehicle crashes in 2000 which is above the 1995 to 1999 average of 39 per cent; and
- rear-end crashes contributed a slightly lower proportion of fatal multi-vehicle crashes (six per cent), compared with the previous five-year average (nine per cent), whereas sideswipe crashes are 19 per cent above the previous five-year average.

Multi-vehicle crashes in which at least one road user was hospitalised but no road user was killed totalled 1784 in 2000. This figure is an increase on the 1999 total (1688) and 120 above the average of the 1995 to 1999 period. Table 4.4 presents multi-vehicle crash data involving hospitalisation for 1995 to 2000 by the nature of the crash.

**Table 4.4: Multi-vehicle crashes involving hospitalisation by nature of crash
Queensland 1995-2000**

Nature of crash	1995		1996		1997		1998		1999		2000	
	No.	%										
Angle	1043	60%	1035	61%	976	63%	997	61%	1020	60%	1110	62%
Head-on	229	13%	224	13%	165	11%	177	11%	163	10%	138	8%
Rear-end	293	17%	297	17%	279	18%	325	20%	361	21%	376	21%
Sideswipe	161	9%	146	9%	141	9%	145	9%	144	9%	160	9%
Total	1726	100%	1702	100%	1561	100%	1644	100%	1688	100%	1784	100%

Table 4.4 indicates that:

- the majority (62 per cent) of multi-vehicle crashes involving hospitalisation in 2000 were angle crashes (i.e. intersection collisions). This proportion is almost twice that for fatal angle crashes which accounted for 34 per cent of multi-vehicle fatal crashes; and
- the proportion of rear-end, head-on, angle and sideswipe crashes involving hospitalisation has remained relatively constant over the last six-year period.

4.4 Single vehicle crashes

The trend in fatal single vehicle crashes over the last five years has been tending downward only to have an increase in 2000 (see Table 4.5). The majority of these crashes in 2000 occurred between intersections (86 per cent) with 72 per cent involving cars and two-thirds being speed related. Compared with all fatal crashes in 2000, fatal single vehicle crashes were proportionally more likely to involve speed (142 per cent more likely), fatigue (121 per cent more likely), alcohol (66 per cent more likely) and 64 per cent more likely to involve motorcycles. Similarly, fatal single vehicle crashes were less likely to occur at operating traffic lights (78 per cent less likely), at Give Way/Stop signs (59 per cent less likely) and were 71 per cent less likely to result from disobeying traffic rules.

In 2000, 137 fatal single vehicle crashes were reported. This figure is 28 crashes (or 26 per cent) more than the 1999 total and equal to the average of the 1995 to 1999 period. In Table 4.5 single vehicle fatal crash data are presented for 1995 to 2000 by the nature of the crash.

**Table 4.5: Single vehicle fatal crashes by nature of crash
Queensland 1995-2000**

Nature of crash	1995		1996		1997		1998		1999		2000	
	No.	%										
Hit object	105	62%	93	60%	95	71%	80	68%	65	60%	79	58%
Overtaken	47	28%	45	29%	25	19%	24	20%	27	25%	40	29%
Hit parked vehicle	7	4%	4	3%	3	2%	6	5%	5	5%	6	4%
Fall from vehicle *	11	6%	13	8%	11	8%	8	7%	12	11%	12	9%
Total	170	100%	155	100%	134	100%	118	100%	109	100%	137	100%

* Vehicle include motor or pedal cycle

Table 4.5 indicates that:

- 79 single vehicle fatal crashes in 2000 (58 per cent) involved vehicles hitting objects (such as trees or power poles). This is above the 1995 to 1999 average (64 per cent); and
- the other major category in 2000, vehicle overturning, represents 29 per cent of the total number of fatal single vehicle crashes for that year. The number of overturning fatal crashes was 6 (or 19 per cent) higher than the average for the previous five years of 34 fatal crashes.

In 2000, there were 1524 single vehicle crashes in which a road user was hospitalised. This figure is 123 above the figure for 1999 and 110 (or eight per cent) above the average for the 1995 to 1999 period. In Table 4.6 data are presented for single vehicle crashes involving hospitalisation for the period 1995 to 2000 by the nature of crash.

**Table 4.6: Single vehicle crashes involving hospitalisation by nature of crash
Queensland 1995-2000**

Nature of crash	1995		1996		1997		1998		1999		2000	
	No.	%										
Hit object	841	58%	840	60%	861	64%	903	62%	894	64%	906	59%
Overtaken	412	28%	346	25%	313	23%	326	22%	290	21%	384	25%
Hit parked vehicle	88	6%	80	6%	61	5%	87	6%	86	6%	92	6%
Fall from vehicle *	115	8%	139	10%	120	9%	140	10%	131	9%	142	9%
Total	1456	100%	1405	100%	1355	100%	1456	100%	1401	100%	1524	100%

* Vehicle includes motor or pedal cycle

Table 4.6 indicates that:

- 59 per cent of the single vehicle crashes involving hospitalisation in 2000 (906 of a total 1524) resulted from a vehicle hitting an object. This proportion is below the 1999 level of 64 per cent, and two percentage points below the 1995 to 1999 average of 61 per cent;
- vehicles overturning represented 25 per cent of single vehicle crashes involving hospitalisation in 2000. This proportion is one percentage point higher than the 1995 to 1999 average of 24 per cent; and
- in 2000, motorcyclists, bicyclists or other vehicle occupants falling from their vehicles represented nine per cent of single vehicle crashes involving hospitalisation. The number of this crash type in 2000 (142 hospitalisation crashes) is 10 per cent higher than the 1995 to 1999 average of 129.

4.5 Crashes by time of day

The long term trend in the proportion of fatal crashes occurring after dark increased from 1991 to 1995 but has generally declined since then as shown in Table 4.7.

**Table 4.7: Annual trends in the nature of fatal crashes occurring after dark
Queensland 1991-2000**

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Fatal crashes after dark	149	161	150	154	171	142	152	102	124	112
All fatal crashes	359	363	357	368	408	338	321	257	273	276
% after dark	42%	44%	42%	42%	42%	42%	47%	40%	45%	41%

Different patterns appear when looking at high-risk periods of the day for multi-vehicle and single vehicle fatal crashes. Generally speaking, the majority of multi-vehicle fatal crashes occurred most frequently during daytime periods, while single vehicle crashes occurred more often after dark. Figure 4.3 demonstrates this occurrence for crashes in 2000.

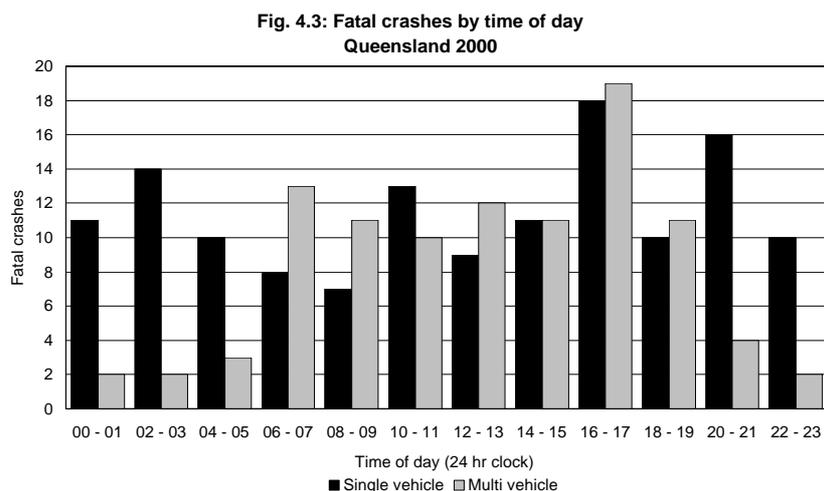


Figure 4.3 indicates that:

- during morning and afternoon commuting periods (6 to 10 a.m. and 4 to 6 p.m.), 35 per cent of multi-vehicle fatal crashes occurred with a similar percentage (33 per cent) for single vehicle fatal crashes;
- during the balance of daylight hours (10 a.m. to 4 p.m.), 33 per cent of multi-vehicle fatal crashes occurred, in contrast to 24 per cent of single vehicle fatal crashes; and
- during the after dark periods (6 p.m. to 6 a.m.), the trend was reversed; 24 per cent of fatal multi-vehicle crashes occurred, in contrast to 52 per cent of fatal single vehicle crashes.

An analysis of the data in Table 4.8 reveals that crashes, which occurred after dark, are more likely to result in a fatality than daytime crashes.

**Table 4.8: Crashes by time of day by severity
Queensland 2000**

Time period	Fatal		Hospitalisation		All crashes*	
	No.	%	No.	%	No.	%
Midnight - 6 am	48	17%	370	10%	1687	9%
6 am - 10 am	44	16%	709	19%	3737	19%
10 am - 4 pm	73	26%	1320	35%	7236	37%
4 pm - 6 pm	47	17%	547	15%	2955	15%
6 pm - midnight	64	23%	821	22%	4017	20%
Total	276	100%	3767	459%	19632	100%

* Including casualty and property damage only

Table 4.8 indicates that:

- 40 per cent of fatal crashes occurred after dark (i.e. 6 p.m. to 6 a.m.) compared with 29 per cent for all crashes. Between midnight and 6 a.m. the proportion of fatal crashes at 17 per cent was almost double that of all crashes (nine per cent); and
- the reverse trend applied during the middle of the day (between 10 a.m. and 4 p.m.) when 37 per cent of all reported crashes occurred while 26 per cent of fatal crashes occurred during this period.

4.6 Crashes by day of week

The long-term trend in the fatal crashes by day of week has remained stable over the period 1991 to 2000 (see Table 4.9). In 2000, fatal crashes on Sunday and Monday showed the biggest decreases of 29 and 22 per cent respectively when compared to the previous 9 year average.

**Table 4.9: Annual trends in fatal crashes by day of week
Queensland 1991-2000**

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Monday	47	53	41	42	45	36	30	31	33	31
Tuesday	35	36	41	43	43	48	44	25	24	36
Wednesday	41	46	45	54	58	34	45	32	29	35
Thursday	44	44	45	50	52	46	42	36	35	41
Friday	66	69	59	65	74	53	56	39	57	47
Saturday	74	67	65	59	67	60	64	55	50	49
Sunday	52	48	61	55	69	61	40	39	45	37

During 2000 the number of crashes generally increased as the week progressed, with most categories of crashes peaking on Friday or Saturday.

Table 4.10 presents the number of crashes by the day of week grouped by the severity of the crash.

**Table 4.10: Crashes by day of week by severity
Queensland 2000**

Day of week	Fatal		Hospitalisation		All crashes*	
	No.	%	No.	%	No.	%
Monday	31	11%	470	12%	2636	13%
Tuesday	36	13%	503	13%	2639	13%
Wednesday	35	13%	537	14%	2819	14%
Thursday	41	15%	543	14%	3073	16%
Friday	47	17%	613	16%	3292	17%
Saturday	49	18%	603	16%	2811	14%
Sunday	37	13%	498	13%	2362	12%
Total	276	100%	3767	100%	19632	100%

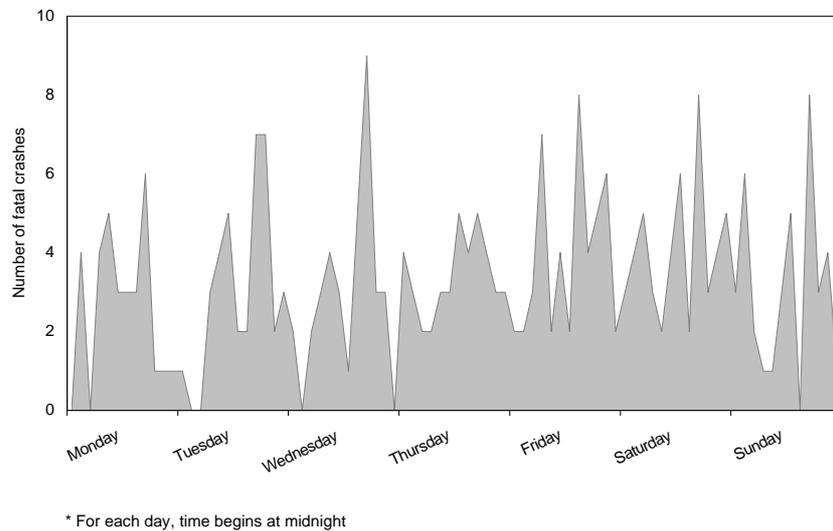
* Including casualty and property damage only

As indicated in Table 4.10, in 2000:

- Friday and Saturday were the days on which the most severe crashes were more likely to occur. Approximately 35 per cent of fatal and one third of hospitalisation and all crashes occurred on these days; and
- the day less likely to have fatal crashes was Monday (11 per cent). Monday also recorded the lowest number of hospitalisation crashes (12 per cent).

Combining the fatal crash trends for day of week with time of day, it is seen that the numbers of crashes generally peak in the late afternoon hours each day. Figure 4.4 shows these trends for 2000.

**Fig. 4.4: Fatal crashes by time of day* & day of week
Queensland 2000**



4.7 Spatial location of crashes

Forty-two per cent of Queensland's reported road crashes in 2000 occurred in the greater Brisbane urban area (Brisbane City and Rest of Brisbane Statistical Division). Some 8309 crashes occurred in this area during 2000. A further 5754 crashes (or 29 per cent) occurred in Queensland provincial cities in 2000. Fatal crashes are more likely to occur outside of urban areas (shown in Table 4.11 as "rest of state") than crashes of lower severity.

**Table 4.11: Location of crashes by severity
Queensland 2000**

Location	Fatal		Hospitalisation		All crashes**	
	No.	%	No.	%	No.	%
Brisbane City	33	12%	873	23%	5524	28%
Rest of BSD*	35	13%	520	14%	2785	14%
Provincial cities	72	26%	1136	30%	5754	29%
Rest of state	136	49%	1238	33%	5569	28%
Total	276	100%	3767	100%	19632	100%

* Brisbane Statistical Division

** Including casualty and property damage only

As indicated in Table 4.11:

- during 2000, 28 per cent of all reported crashes in Queensland occurred in Brisbane City, but only 12 per cent of fatal crashes occurred in the metropolitan area; and
- while 28 per cent of Queensland's reported crashes occurred outside urban areas, 49 per cent of fatal crashes occurred in these non-urban areas.

Table 4.12 shows the location of fatal crashes.

**Table 4.12: Location of fatal crashes
Queensland 1995-2000**

Location	1995		1996		1997		1998		1999		2000	
	No.	%										
Brisbane City	58	14%	50	15%	39	12%	34	13%	39	14%	33	12%
Rest of BSD*	44	11%	39	12%	37	12%	26	10%	33	12%	35	13%
Provincial cities	110	27%	113	33%	80	25%	77	30%	64	23%	72	26%
Rest of state	196	48%	136	40%	165	51%	120	47%	137	50%	136	49%
Total	408	100%	338	100%	321	100%	257	100%	273	100%	276	100%

* Brisbane Statistical Division

As indicated in Table 4.12:

- Brisbane City had 33 fatal crashes (or 12 per cent of the state total) in 2000 which, while consistent in percentage terms is lower than the average of 44 fatal crashes over the 1995 to 1999 period; and
- rest of BSD had 35 fatal crashes (or 13 per cent of the state total) in 2000, which is slightly lower than the 1995 to 1999 average of 36 fatal crashes.

Table 4.13 shows the location of crashes of different severities listed by Queensland Transport districts.

**Table 4.13: Location of crashes by severity
Queensland 2000**

Department of Main Roads District Location	Fatal		Hospitalisation		All crashes*	
	No.	%	No.	%	No.	%
Barcaldine	2	1%	30	1%	97	0%
Bundaberg	15	5%	208	6%	897	5%
Cairns	22	8%	264	7%	1208	6%
Cloncurry	6	2%	45	1%	180	1%
Emerald	7	3%	42	1%	184	1%
Gympie	37	13%	410	11%	2182	11%
Mackay	14	5%	131	3%	662	3%
Metropolitan Brisbane	56	20%	1337	35%	8284	42%
Nerang	39	14%	509	14%	2239	11%
Rockhampton	22	8%	183	5%	922	5%
Roma	3	1%	36	1%	152	1%
Toowoomba	27	10%	254	7%	1277	7%
Townsville	15	5%	248	7%	1042	5%
Warwick	11	4%	70	2%	306	2%
Total	276	100%	3767	100%	19632	100%

* Including casualty and property damage only

The table shows that:

- Metropolitan Brisbane, Nerang and Gympie accounted for 64 per cent of reported crashes, and 47 per cent of fatal crashes;
- the highest proportion of crashes for all severity levels occurred in Brisbane, with over 40 per cent of Queensland's crashes; and
- Brisbane also recorded the highest number of fatal crashes with 56 (or 20 per cent), followed by Nerang and Gympie, with 39 fatal crashes (or 14 per cent) and 37 fatal crashes (or 13 per cent) respectively.

5. FACTORS CONTRIBUTING TO CRASHES

5.1 Introduction

It is relatively uncommon for a single factor to be identified as the sole cause of a crash. Several factors are often represented in the “causal chain” of events resulting in crashes. However, issues such as alcohol use, excessive speed, fatigue (which are consistently reported as the causal factor by investigating police) and the failure to wear seat belts are discussed in more detail in this chapter.

Table 5.1 presents information collected by the police at the scene of traffic crashes concerning the causes of crashes. The data is usually collected within 24 hours of a crash, and the assessment of contributing factors may differ from those arrived at after a more complete investigation. However the table provides an indicative ranking of the major causal factors.

Table 5.1: Assessed contributing factors to crashes* - Queensland 2000

	Fatal crashes		All reported crashes	
	No.	Proportion of fatal crashes	No.	Proportion of all reported crashes
Disobeyed traffic rules**	95	34%	7613	39%
Alcohol/drugs	93	34%	1706	9%
Speed	46	17%	936	5%
Inexperience	41	15%	4449	23%
Inattention	38	14%	6116	31%
Other	36	13%	2778	14%
Age	33	12%	982	5%
Fatigue	28	10%	1149	6%
Other driver conditions **	27	10%	1302	7%
Negligence	18	7%	380	2%
Rain/wet road	14	5%	1521	8%
Road conditions	12	4%	928	5%
Vehicle defects	8	3%	623	3%
No street lighting	4	1%	92	0%
Total crashes	276	100%	19632	100%

* More than one contributing factor could be attributed to a crash and therefore this table may not reflect crash totals

** Driver conditions do not include Inattention, Negligence, Inexperience, Fatigue, Age

*** Disobeyed traffic rules does not include Alcohol/Drugs, Inexperience, Speed and Inattention

The data presented in Table 5.1 concerning police opinion of cause-of-crash indicates that:

- disobey traffic rules was the largest contributor, being regarded as responsible for 34 per cent of fatal crashes and 39 per cent of all reported crashes during 2000;
- alcohol or drug use was the second largest contributor with 34 per cent of fatal crashes, but only nine per cent of all reported crashes;
- inexperience was cited as the fourth-ranking contributor for fatal crashes and ranked third for all reported crashes;
- whilst inattention was a contributing factor in 31 per cent of all reported crashes, it contributed to 14 per cent of fatal crashes;
- speed contributed to five per cent of all crashes and 17 per cent of fatal crashes; and
- other factors such as (medical condition, some atmospheric and lighting conditions etc) were considered to have contributed to 13 per cent of fatal crashes and 14 per cent of all reported crashes.

Fatigue and negligence are difficult to assess and thus may be understated in the data.

5.2 Trends

Long term trends in contributing circumstances in fatal crashes are shown in Table 5.2. The top contributing circumstance (disobeyed traffic rules) showed a slight decrease in 2000 compared with 1999 and remained well below the high numbers of the mid-1990's.

Table 5.2: Annual trends in contributing circumstances in fatal crashes

Queensland 1991-2000										
	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Disobeyed traffic rules	110	107	125	125	128	115	110	73	96	95
Alcohol/drugs	138	107	98	103	132	101	101	86	85	93
Inexperience	26	69	57	82	102	91	95	62	52	41
Speed	52	66	80	51	46	48	51	30	39	46
Other driver conditions	23	45	51	42	50	32	26	31	25	27
Age	30	54	35	36	41	30	28	25	28	33
Rain/wet road	19	47	25	35	41	22	16	29	10	14
Negligence	12	19	15	31	25	14	17	19	19	18
Inattention	31	25	15	24	41	26	26	28	47	38
Road conditions	21	32	35	23	29	26	9	14	14	13
Other	29	48	21	23	41	31	36	22	32	36
Vehicle defects	17	23	21	11	17	13	7	13	14	8
Fatigue	37	38	50	34	48	54	45	30	26	28
No street lighting	27	15	3	6	7	5	9	9	1	4

5.3 Alcohol and road fatalities

Alcohol use is considered to contribute to a substantial proportion of the more severe crashes, especially those involving a fatality (see Table 5.1). Drivers, motorcycle and bicycle riders, and pedestrians affected by alcohol play a major role in road crashes, and the extent of alcohol involvement in fatal crashes is analysed in more detail in the following section.

Table 5.3 presents information on the level of post-mortem testing of driver and motorcycle rider fatalities over the period 1995 to 2000, and the blood alcohol content (BAC) of those tested.

Table 5.3: Blood alcohol content of driver and motorcycle rider fatalities*

Queensland 1995-2000												
	1995		1996		1997		1998		1999		2000	
	No.	%										
Untested	37	16%	42	20%	26	13%	15	10%	40	20%	22	12%
Tested	195	84%	171	80%	172	87%	129	90%	127	64%	165	88%
Total Fatalities	232	100%	213	100%	198	100%	144	100%	199	100%	187	100%
BAC results for those tested:												
Nil	113	58%	106	62%	113	66%	87	67%	89	70%	106	64%
.01-.04 %	18	9%	5	3%	13	8%	8	6%	6	5%	13	8%
.05 - .14 %	20	10%	19	11%	21	12%	15	12%	15	12%	13	8%
.15 - .24 %	31	16%	31	18%	15	9%	14	11%	8	6%	23	14%
.25% and above	13	7%	10	6%	10	6%	5	4%	9	7%	10	6%
BAC .05% or more	64	33%	60	35%	46	27%	34	26%	32	25%	46	28%
BAC .15% or more	44	23%	41	24%	25	15%	19	15%	17	13%	33	20%

* Based on post-mortem tests

The table indicates that alcohol involvement in crashes has declined since 1996. However 2000 figures have risen back to 1997 levels. Total driver and rider fatalities involving a BAC of 0.05 per cent or greater for 2000 was 46, a decrease of 1 fatality over the 1995 to 1999 average of 47.

Of 187 driver and motorcycle rider fatalities during 2000:

- 88 per cent were given a post-mortem blood alcohol test;
- of those tested, 28 per cent had a BAC at or in excess of the general legal limit of 0.05 per cent for open license holders and provisional license holders over 25 years. This figure is four percentage points lower than the 1995 to 1999 average; and
- 20 per cent of those tested had a BAC of 0.15 per cent or greater (three times the legal limit for most open license holders). In 2000, 33 fatalities recorded these levels which is a 94 per cent increase over 1999. Compared with the average of the previous five years of 29, 2000 figures have increased 12 per cent.

Figure 5.1 provides a graphical representation of blood alcohol levels for all driver and motorcycle rider fatalities in 2000.

Fig. 5.1: Blood alcohol level for driver & motorcycle rider fatalities Queensland 2000

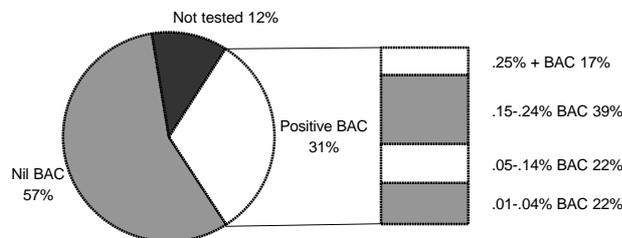


Table 5.4 presents data by year from 1995 to 2000 on the age groups of fatally injured drivers and motorcycle riders who were found to have a blood alcohol content of 0.05 per cent or greater.

Table 5.4: Age of drivers and motorcycle rider fatalities with BAC of 0.05% or greater* Queensland 1995-2000

Age group	1995		1996		1997		1998		1999		2000	
	No.	%										
0 - 16 years	0	0%	1	2%	2	4%	0	0%	2	6%	0	0%
17 - 24 years	11	17%	31	52%	14	30%	11	32%	7	22%	8	17%
25 - 59 years	47	73%	28	47%	30	65%	22	65%	21	66%	37	80%
60 years and over	6	9%	0	0%	0	0%	1	3%	2	6%	1	2%
Total	64	100%	60	100%	46	100%	34	100%	32	100%	46	100%

* Based on post-mortem tests

The table indicates that:

- illegal BACs have been found almost exclusively in drivers and motorcycle riders between the ages of 17 and 59 years; and
- in 2000, 17 per cent of driver and motorcycle rider fatalities with illegal BACs were aged between 17 and 24 years. This was well below the previous five-year average of 31 per cent. The result for ages 25 to 59 years of 80 per cent was above the previous five-year average of 63 per cent.

Table 5.5 provides information on the four main road user groups (drivers, motorcycle riders, bicyclists and pedestrians) in terms of positive blood alcohol tests following a fatal crash.

**Table 5.5: Road user fatalities with BAC of 0.05% or greater*
Queensland 1995-2000**

Roaduser type	1995		1996		1997		1998		1999		2000	
	No.	%										
Bicyclist	2	3%	1	1%	0	0%	0	0%	0	0%	0	0%
Driver	49	62%	50	70%	38	57%	29	53%	26	54%	36	62%
Motorcyclist	15	19%	10	14%	8	12%	5	9%	6	13%	10	17%
Pedestrian	13	16%	10	14%	21	31%	21	38%	16	33%	12	21%
Total	79	100%	71	100%	67	100%	55	100%	48	100%	58	100%

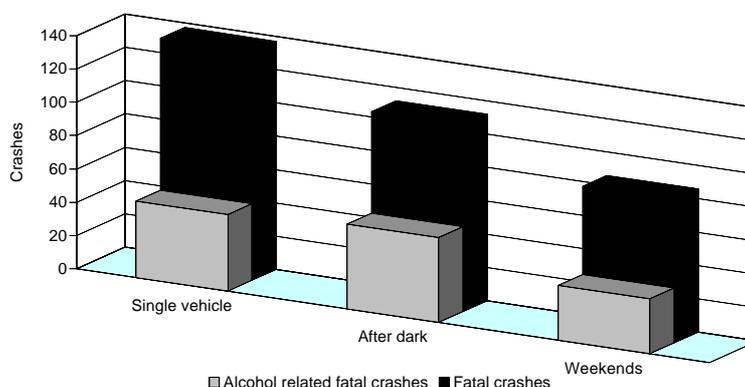
* Based on post-mortem tests

It can be seen that:

- drivers made up the largest group of alcohol-involved fatalities in 2000, constituting 62 per cent of fatalities tested with a BAC of 0.05 per cent or greater. This figure is above the previous five-year average of 60 per cent;
- the percentage of pedestrians recording a BAC of 0.05 per cent or greater in 2000 was 21 per cent, a decrease of one third from 1999; and
- 10 motorcycle rider fatalities revealed a BAC of 0.05 per cent or greater in 2000, an increase of 14 per cent on the previous five-year average.

Figure 5.2 shows that the incidence of single vehicle crashes, crashes after dark and crashes on weekends is greatly elevated for alcohol related crashes compared with all crashes.

**Fig. 5.2: Crashes involving alcohol by selected variables
Queensland 2000**



5.4 Speed as a contributing factor to fatalities

Table 5.1 demonstrated that although speed was a contributing factor in five per cent of all reported crashes, it was judged to contribute to 17 per cent of fatal crashes and was the third most often cited contributing factor. Excessive speed for the prevailing conditions is believed to contribute to a further class of crashes.

Table 5.6 sets out information by year on the severities of crashes to which speed was judged by the reporting officer to be a contributing factor.

**Table 5.6: Severity of crashes to which speed was a contributing factor
Queensland 1995-2000**

Severity	1995		1996		1997		1998		1999		2000	
	No.	%										
Fatal	46	5%	48	6%	51	6%	30	4%	40	5%	46	5%
Hospitalisation	214	24%	177	22%	177	22%	215	25%	211	25%	237	25%
Other injury	237	27%	259	32%	228	28%	233	27%	210	25%	256	27%
Property damage	385	44%	334	41%	348	43%	378	44%	392	46%	397	42%
Total	882	100%	818	100%	804	100%	856	100%	853	100%	936	100%

The table shows that the distribution of severity levels in crashes to which speed was a contributing factor remained relatively constant from 1995 to 1999. All severity levels in 2000 recorded increases in crash numbers. The involvement of speed in fatal crashes in 2000 was seven per cent above the 1995 to 1999 average of 43 fatal crashes.

The age groups of fatally injured road users involved in crashes to which speed was considered to be a contributing factor are presented in Table 5.7.

**Table 5.7: Age of fatalities in crashes to which speed was a contributing factor
Queensland 1995-2000**

Age group	1995		1996		1997		1998		1999		2000	
	No.	%										
0 - 16 years	4	7%	3	5%	1	2%	4	12%	5	11%	1	2%
17 - 24 years	20	36%	31	55%	30	52%	19	56%	13	30%	20	38%
25 - 59 years	27	49%	19	34%	27	47%	11	32%	24	55%	32	60%
60 years and over	4	7%	3	5%	0	0%	0	0%	2	5%	0	0%
Total	55	100%	56	100%	58	100%	34	100%	44	100%	53	100%

The table shows that the proportions of each age group involved in speed-related fatal crashes have shown an erratic trend over the period 1995 to 2000. However, in 2000, fatal crashes involving speed among young adults (aged 17 to 24 years) showed an increase of 54 per cent when compared with 1999. This age group comprised 38 per cent of all speed-related fatalities in 2000.

5.5 Fatigue as a contributing factor

It is often difficult to isolate fatigue as a factor in crashes, particularly in the more severe crashes. One means of identifying likely fatigue-related crashes is to analyse single vehicle-type crashes (such as roll-over or hit object) on open roads during high-risk times for fatigue (i.e. 2 pm to 4 pm and 10 pm to 6 am). Also included in this analysis are other crashes where police reported fatigue to be a contributing factor. Naturally, this approach will ignore crashes which occur at other times of day, occur in urban areas or are multi-vehicle collisions (e.g. head-on crashes), unless positively identified as a fatigue crash by police. However, the assumptions described above do point to factors which collectively constitute the major ingredients for fatigue crashes and therefore allow consistent analysis.

**Table 5.8: Severity of fatigue related crashes*
Queensland 1995-2000**

Severity	1995		1996		1997		1998		1999		2000	
	No.	%										
Fatal	47	4%	53	4%	44	4%	34	3%	27	2%	28	2%
Hospitalisation	328	25%	322	25%	334	27%	324	28%	293	25%	309	26%
Other injury	377	29%	400	31%	370	30%	314	27%	372	31%	350	30%
Property damage	538	42%	501	39%	486	39%	501	43%	489	41%	495	42%
Total	1290	100%	1276	100%	1234	100%	1173	100%	1181	100%	1182	100%

* Single vehicle-type crashes in 100km/h zones during typical fatigue times (2-4pm, 10pm-6am) or where police considered fatigue was a contributing factor.

The data presented in Table 5.8 indicates that:

- overall, the total number of fatigue-related crashes in 2000 was less than one per cent higher than the 1999 figure but four per cent lower than the five-year average of 1231 crashes; while
- the number of fatigue-related fatal crashes increased by four per cent in 2000 compared with 1999 but was 32 per cent below the 1995 to 1999 average.

An analysis of fatigue-related fatalities by various age groups is presented in Table 5.9.

**Table 5.9: Fatalities by age group: fatigue related crashes
Queensland 1995 - 2000**

Age group	1995		1996		1997		1998		1999		2000	
	No.	%										
0 - 16 years	2	4%	5	9%	5	11%	2	5%	6	18%	1	3%
17 - 24 years	22	42%	21	38%	20	43%	20	50%	7	21%	15	38%
25 - 59 years	24	45%	27	49%	20	43%	17	43%	20	59%	17	44%
60 years and over	5	9%	2	4%	2	4%	1	3%	1	3%	6	15%
Total	53	100%	55	100%	47	100%	40	100%	34	100%	39	100%

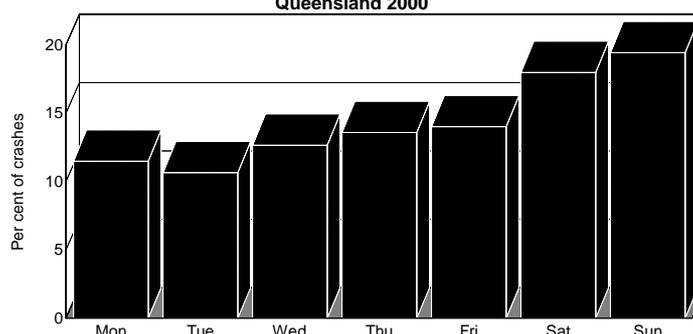
* Single vehicle-type crashes in 100km/h zones during typical fatigue times (2-4pm, 10pm-6am) or where police considered fatigue was a contributing factor.

Table 5.9 indicates that:

- during 2000, the number of 0 to 16 year old fatigue-related fatalities decreased greatly when compared with this age group in 1999 and shows a 67 per cent decrease against the previous five-year average of nine per cent; and
- 44 per cent of Queensland's fatigue-related fatalities in 2000 were aged 25 to 59 years (three percentage points above the previous five-year average of 47 per cent).

An analysis by day of week of single-vehicle crashes on open roads during typical fatigue periods shows that, for 2000, fatigue-related crashes were most likely to occur on Saturdays and Sundays. Figure 5.3 charts the occurrence of fatigue-related crashes by day of week.

**Fig. 5.3: Fatigue-related crashes by day of week
Queensland 2000**

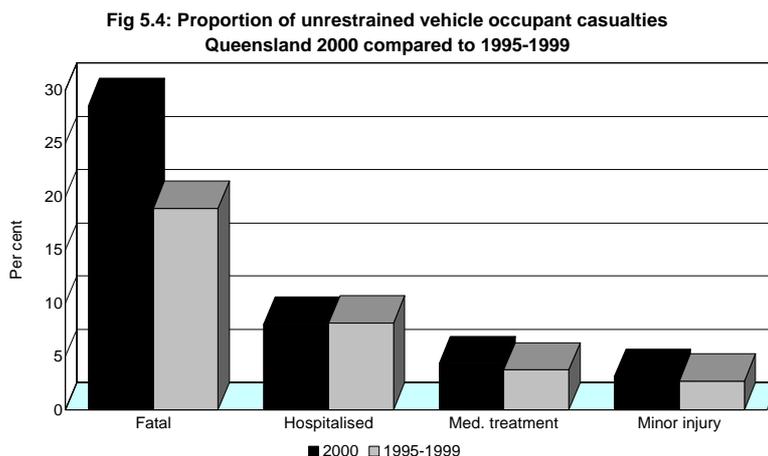


Analysis of previous years' data has revealed that the most over-represented days for fatigue-related crashes are the weekend and Friday. In 2000, this trend continued with 52 per cent of fatigue-related crashes occurring on Fridays, Saturdays and Sundays.

5.6 Seat belt usage in fatal crashes

Recent research indicates that seat belt wearing rates have improved in the general driving population over the past five years. However, in 2000, 33 per cent of vehicle occupants were unrestrained (where restraint use could be determined) compared with the previous five-year average of 28 per cent.

Figure 5.4 shows that the greater the severity of a road crash, the less likely it was that seat belts were worn.



As indicated in Figure 5.4:

- in 2000, 29 per cent of vehicle occupant fatalities were unrestrained compared with eight per cent of hospitalised casualties, four per cent of persons medically treated, and three per cent of persons receiving minor injuries; and
- the incidence rate for unrestrained fatalities in 2000 was 10 percentage points above the previous five-year average.

In many instances, investigating police were unable to determine whether or not a vehicle occupant was wearing a restraint at the time of a crash. Table 5.10 presents seat belt usage data for vehicle occupant fatalities in instances where restraint use could be determined. It should be noted that bus passengers are not included as vehicle occupants for seat belt analysis.

Table 5.10: Fatalities by seat belt usage - Queensland 1995-2000

	1995		1996		1997		1998		1999		2000	
	No.	%										
Occupants:												
Not determined	105	36%	89	33%	88	36%	62	32%	64	30%	63	27%
Total determined	190	64%	182	67%	155	64%	131	68%	147	70%	172	73%
Total vehicle occupants	295	100%	271	100%	243	100%	193	100%	211	100%	235	100%
Of those occupants where restraint use could be determined:												
Restrained	141	74%	137	75%	110	71%	97	74%	98	67%	115	67%
Unrestrained	49	26%	45	25%	45	29%	34	26%	49	33%	57	33%
Drivers:												
Not determined	65	37%	48	28%	49	31%	37	31%	36	29%	39	25%
Total determined	112	63%	122	72%	107	69%	83	69%	89	71%	116	75%
Total drivers	177	100%	170	100%	156	100%	120	100%	125	100%	155	100%
Of those drivers where restraint use could be determined:												
Restrained	86	77%	92	75%	75	70%	63	76%	65	73%	77	66%
Unrestrained	26	23%	30	25%	32	30%	20	24%	24	27%	39	34%
Passengers:												
Not determined	40	34%	41	41%	39	45%	25	34%	28	33%	24	30%
Total determined	78	66%	60	59%	48	55%	48	66%	58	67%	56	70%
Total vehicle passengers	118	100%	101	100%	87	100%	73	100%	86	100%	80	100%
Of those passengers where restraint use could be determined:												
Restrained	55	71%	45	75%	35	73%	34	71%	33	57%	38	68%
Unrestrained	23	29%	15	25%	13	27%	14	29%	25	43%	18	32%

The data in Table 5.10 indicates that:

- the percentage of cases of fatally injured vehicle occupants where restraint use could not be determined decreased from 30 per cent in 1999 to 27 per cent in 2000;
- restraint use by fatally injured vehicle occupants indicates an increase in unrestrained occupants. In 2000, 33 per cent of drivers and passengers killed on Queensland roads were unrestrained, compared with an average of 28 per cent during the previous five-year period, showing a five percentage point increase; and
- fatally injured drivers were less likely to be wearing a seat belt than fatally injured passengers in 2000.

Table 5.11 shows a breakdown by age group of unrestrained vehicle occupants who were fatally injured for the period 1995 to 2000. The percentages represent the proportion of all vehicle occupant fatalities in that age group (where restraint use could be determined).

**Table 5.11: Unrestrained vehicle occupant fatalities by age group
Queensland 2000 compared with average (1995-1999) ***

Age group	2000			Average 1995-1999		
	Unrestrained	Total	%	Unrestrained	Total	%
0 - 16 years**	9	18	50%	4	13	31%
17 - 24 years	9	33	27%	13	47	28%
25 - 39 years	23	50	46%	15	37	41%
40 - 59 years	10	39	26%	7	33	21%
60 years and over	6	32	19%	5	31	16%
Total	57	172	33%	44	161	27%

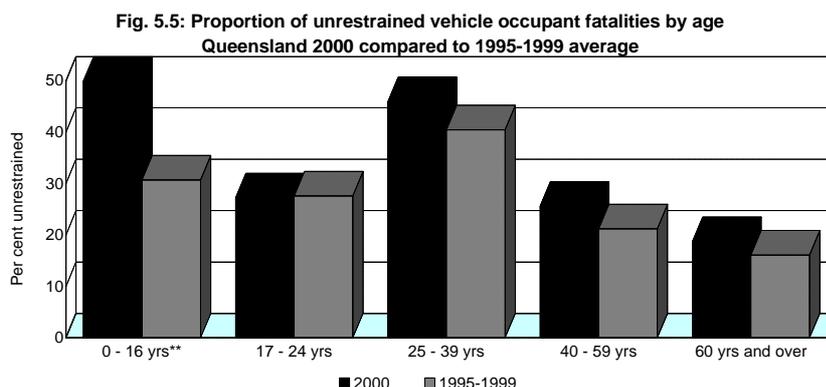
* Where restraint use could be determined

** Includes casualties of unknown age

The data presented in Table 5.11 indicate that:

- 50 per cent of vehicle occupants aged 0 to 16 years killed in road crashes during 2000 were unrestrained, making this the age group with least compliance;
- the 25 to 39 years age group, with 46 per cent non compliance, was the group next most likely to be unrestrained; and
- the only improvement over 1995 to 1999 occurred in the 17 to 24 years age group where the proportion of unrestrained vehicle occupants in 2000 decreased by one percentage point.

Figure 5.5 illustrates for various age groups the proportion of unrestrained vehicle occupant fatalities in 2000 compared with the average of the previous five years.



APPENDIX 1 GLOSSARY

Road users are defined as:

- drivers of motor vehicles other than a motorcycle
- motorcycle riders
- bicycle riders
- horse riders
- passengers of the above
- pedestrians

A *road traffic crash* is a crash reported to the police which resulted from the movement of at least one road vehicle on a road and involving death or injury to any person, or property damage.

A *property damage only crash* is a crash where at least one vehicle is towed away or the damage cost is greater than \$2,500 (or \$1000 prior to 1 December 1991).

The *road toll* is a count of fatalities (excluding injuries) resulting from road traffic crashes.

A *fatality* is recorded when any person dies within 30 days as a result of injuries sustained in a road traffic crash.

A *serious injury* is recorded when any person involved in a road traffic crash: (a) requires hospitalisation (i.e. is admitted to hospital) or (b) requires medical treatment.

An *injury* is recorded when any person involved in a road traffic crash: (a) requires hospitalisation; (b) requires medical treatment; or (c) receives a minor injury (i.e. first aid treatment only).

A *casualty* is the grouping of both fatalities and injuries.

A *single vehicle crash* is a crash in which only one moving motor vehicle is involved in the initial event, either in a collision (e.g. with a roadside pole) or a non-collision (e.g. a roll over). A collision with a parked car is considered a single vehicle crash because the characteristics of this type of crash are similar to crashes where a vehicle collides with a roadside object.

A *multi-vehicle crash* is a crash which involves an initial collision between any two (or more) moving motor vehicles.

A *blood alcohol content (BAC)* reading is a measure of the proportion of alcohol in a person's blood. This reading is typically obtained using a breathalyser or by conducting a blood

test. Where possible, a post-mortem blood analysis is carried out on a fatally injured road user.

A *controller* is a road user who exercises control over their movements at the time of an accident (i.e. driver, rider or pedestrian). Passengers are not regarded as controllers.

A *child* is regarded as being a road user aged under 17 years.

A *young adult* is a road user aged from 17 to 24 years.

A *mature aged road user* is a person who is aged from 25 to 59 years.

An *older road user* is a person who is aged 60 years or over.

Heavy freight vehicle refers to both rigid and articulated trucks.

A *vehicle occupant* is a person travelling in a car, utility, panel van, bus, rigid truck or articulated vehicle at the time of a crash.

A *driver* is the vehicle occupant in control of a motor vehicle at the time of a crash.

A *passenger* is any other occupant of a motor vehicle at the time of a crash.

A *motorcyclist* is either the rider or pillion passenger of a motorcycle.

A *pedal cyclist* is either the rider or pillion passenger of a bicycle.

A *pedestrian* is either an ordinary pedestrian or a person on skates, rollerblades or a skateboard.

A *peak commuter* period refers to that time of day when most commuters are either travelling to or returning from work. For this report it is considered to cover the periods from 6.00 am to 10.00 am and 4.00 pm to 6.00 pm, Monday to Friday.

The *provincial cities* are: Gold Coast, Gladstone, Charters Towers, Warwick, Cairns, Maryborough, Townsville, Gympie, Mackay, Mount Isa, Bundaberg, Rockhampton, Toowoomba, Hervey Bay City, Caloundra City and Thuringowa City.

APPENDIX 2 KEY SUMMARY TABLES

In this section, major characteristics of road traffic crashes in Queensland during 2000 are presented as a series of more detailed cross-tabulations from the Queensland Road Crash System maintained by Queensland Transport's Land Transport and Safety Division. A list of summary tables contained in this section is presented below.

Table No.	Details	Page No.
1	Casualties by road user type, 1995 to 2000	2
2A	Casualties by road user type and age group: males killed 2000	3
2B	Casualties by road user type and age group: females killed 2000	3
2C	Casualties by road user type and age group: persons killed 2000	4
2D	Casualties by road user type and age group: males injured 2000	4
2E	Casualties by road user type and age group: females injured 2000	5
2F	Casualties by road user type and age group: persons injured 2000	5
3A	Casualties by road user type, age group and sex : persons killed 2000	6
3B	Casualties by road user type, age group and sex : persons injured 2000	7
4A	Restraint details by age group: persons killed 2000	8
4B	Restraint details by age group: persons injured 2000	8
5A	Seat belt usage by age group: persons killed 2000	9
5B	Seat belt usage by age group: persons seriously injured 2000	9
6	Seat belt and helmet wearing details by injury severity 2000	10
7	Casualties by road user type and most severe injury sustained: persons killed 2000	11
8A	Controller most responsible for a crash by road user type and age group: males only 2000	12
8B	Controller most responsible for a crash by road user type and age group: females only 2000	13
8C	Controller most responsible for a crash by road user type and age group: persons only 2000	14
9A	Blood alcohol analysis of controllers killed in crashes: 2000	15
9B	Blood alcohol analysis of controllers injured in crashes: 2000	15
10A	Blood alcohol analysis of controllers killed in crashes by age group: 2000	16
10B	Blood alcohol analysis of controllers not killed but may have been injured in crashes by age group: 2000	16
11A	Crashes by time of day and day of week: total crashes 2000	17
11B	Crashes by time of day and day of week: casualty crashes 2000	17
11C	Crashes by time of day and day of week: persons killed 2000	18
11D	Crashes by time of day and day of week: persons injured 2000	18
12	Casualties by road user, vehicle type and severity: 2000	19
13	Crashes by type of unit most responsible and crash severity: 2000	20
14	Single vehicle crashes by vehicle type and crash severity: 2000	21
15	Crashes and casualties by roadway feature and traffic control: 2000	21
16A	Crashes by roadway feature and crash severity: Queensland 2000	22
16B	Crashes by roadway feature and crash severity: Brisbane Statistical Division 2000	22
17	Crashes and casualties by location, crash severity and sex: 2000	23
18	Crashes and casualties by Local Government Area: 2000	24 to 26
19	Annual road toll, population and motor vehicles on register: Queensland 1953 to 2000	27
20	Annual trend data: Queensland 1991-2000	28 to 34

Table 1: Road traffic casualties by road user type - Queensland 1995-2000

Year	Car, Truck, Bus						Motorcycle					
	Driver			Passenger			Rider			Pillion		
	K	H	M	K	H	M	K	H	M	K	H	M
1995	178	2081	3298	119	1291	2039	52	550	481	2	48	51
1996	170	1919	3411	104	1270	2008	39	562	519	2	44	42
1997	157	1832	3328	88	1128	1891	40	504	406	3	42	44
1998	120	1990	3278	75	1168	1840	23	534	383	2	55	35
1999	125	2134	3310	87	1193	1839	39	490	395	2	42	23
2000	155	2227	3387	82	1271	1809	30	482	355	3	37	27

Year	Pedestrian			Pedal Cyclist			Other			All Road Users		
	K	H	M	K	H	M	K	H	M	K	H	M
1995	92	445	398	10	211	411	3	10	13	456	4636	6691
1996	55	411	393	10	259	444	5	16	18	385	4481	6835
1997	59	373	375	12	253	420	1	14	18	360	4146	6482
1998	48	393	336	9	240	427	2	14	21	279	4394	6320
1999	49	385	318	9	241	336	3	15	22	314	4500	6243
2000	40	423	340	6	277	352	2	17	17	318	4734	6287

Legend:

K = Killed, H = Admitted to hospital, M = Received medical treatment

* Includes pillion passengers

**Table 2A: Road traffic casualties Queensland 2000
by road user type and age group**

Road user type	Males killed by age group										Total
	0-4 years	5-16 years	17-20 years	21-25 years	26-29 years	30-39 years	40-49 years	50-59 years	60 & years	Not stated	
Drivers	0	1	14	12	14	32	13	15	18	0	119
%	0.0%	0.8%	11.8%	10.1%	11.8%	26.9%	10.9%	12.6%	15.1%	0.0%	100.0
Passengers	2	11	4	13	2	4	3	0	10	0	49
%	4.1%	22.4%	8.2%	26.5%	4.1%	8.2%	6.1%	0.0%	20.4%	0.0%	100.0
Pedestrians	1	2	3	4	0	2	5	4	8	0	29
%	3.4%	6.9%	10.3%	13.8%	0.0%	6.9%	17.2%	13.8%	27.6%	0.0%	100.0
Motorcycle riders	0	1	2	5	2	12	5	2	0	0	29
%	0.0%	3.4%	6.9%	17.2%	6.9%	41.4%	17.2%	6.9%	0.0%	0.0%	100.0
Motorcycle pillion	0	0	0	1	1	0	0	0	0	0	2
%	0.0%	0.0%	0.0%	50.0%	50.0%	0.0%	0.0%	0.0%	0.0%	0.0%	100.0
Bicycle riders	0	2	0	0	1	1	1	1	0	0	6
%	0.0%	33.3%	0.0%	0.0%	16.7%	16.7%	16.7%	16.7%	0.0%	0.0%	100.0
Bicycle pillion	0	0	0	0	0	0	0	0	0	0	0
%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	100.0
Total killed	3	17	23	35	20	51	27	22	36	0	234
% of total	1.3%	7.3%	9.8%	15.0%	8.5%	21.8%	11.5%	9.4%	15.4%	0.0%	100.0

**Table 2B: Road traffic casualties Queensland 2000
by road user type and age group**

Road user type	Females killed by age group										Total
	0-4 years	5-16 years	17-20 years	21-25 years	26-29 years	30-39 years	40-49 years	50-59 years	60 & years	Not stated	
Drivers	0	0	5	6	6	2	7	5	7	0	38
%	0.0%	0.0%	13.2%	15.8%	15.8%	5.3%	18.4%	13.2%	18.4%	0.0%	100.0
Passengers	4	4	2	3	0	3	3	2	12	0	33
%	12.1%	12.1%	6.1%	9.1%	0.0%	9.1%	9.1%	6.1%	36.4%	0.0%	100.0
Pedestrians	0	0	1	0	0	2	1	0	7	0	11
%	0.0%	0.0%	9.1%	0.0%	0.0%	18.2%	9.1%	0.0%	63.6%	0.0%	100.0
Motorcycle riders	0	0	0	0	0	1	0	0	0	0	1
%	0.0%	0.0%	0.0%	0.0%	0.0%	100.0%	0.0%	0.0%	0.0%	0.0%	100.0
Motorcycle pillion	0	0	0	0	1	0	0	0	0	0	1
%	0.0%	0.0%	0.0%	0.0%	100.0%	0.0%	0.0%	0.0%	0.0%	0.0%	100.0
Bicycle riders	0	0	0	0	0	0	0	0	0	0	0
%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	100.0
Bicycle pillion	0	0	0	0	0	0	0	0	0	0	0
%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	100.0
Total killed	4	4	8	9	7	8	11	7	26	0	84
% of total	4.8%	4.8%	9.5%	10.7%	8.3%	9.5%	13.1%	8.3%	31.0%	0.0%	100.0

**Table 2C: Road traffic casualties Queensland 2000
by road user type and age group**

Road user type	Persons killed by age group										Total
	0-4* years	5-16 years	17-20 years	21-25 years	26-29 years	30-39 years	40-49 years	50-59 years	60 & years	Not stated	
Drivers	0	1	19	18	20	34	20	20	25	0	157
%	0.0%	0.6%	12.1%	11.5%	12.7%	21.7%	12.7%	12.7%	15.9%	0.0%	100.0
Passengers	6	15	6	16	2	7	6	2	22	0	82
%	7.3%	18.3%	7.3%	19.5%	2.4%	8.5%	7.3%	2.4%	26.8%	0.0%	100.0
Pedestrians	1	2	4	4	0	4	6	4	15	0	40
%	2.5%	5.0%	10.0%	10.0%	0.0%	10.0%	15.0%	10.0%	37.5%	0.0%	100.0
Motorcycle riders	0	1	2	5	2	13	5	2	0	0	30
%	0.0%	3.3%	6.7%	16.7%	6.7%	43.3%	16.7%	6.7%	0.0%	0.0%	100.0
Motorcycle pillion	0	0	0	1	2	0	0	0	0	0	3
%	0.0%	0.0%	0.0%	33.3%	66.7%	0.0%	0.0%	0.0%	0.0%	0.0%	100.0
Bicycle riders	0	2	0	0	1	1	1	1	0	0	6
%	0.0%	33.3%	0.0%	0.0%	16.7%	16.7%	16.7%	16.7%	0.0%	0.0%	100.0
Bicycle pillion	0	0	0	0	0	0	0	0	0	0	0
%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	100.0
Total killed	7	21	31	44	27	59	38	29	62	0	318
% of total	2.2%	6.6%	9.7%	13.8%	8.5%	18.6%	11.9%	9.1%	19.5%	0.0%	100.0

* Includes fatalities of unknown gender

**Table 2D: Road traffic casualties Queensland 2000
by road user type and age group**

Road user type	Males injured by age group										Total
	0-4 years	5-16 years	17-20 years	21-25 years	26-29 years	30-39 years	40-49 years	50-59 years	60 & years	Not stated	
Drivers	0	28	694	642	437	808	584	450	472	3	4118
%	0.0%	0.7%	16.9%	15.6%	10.6%	19.6%	14.2%	10.9%	11.5%	0.1%	100.0
Passengers	84	371	339	230	124	184	120	60	86	19	1617
%	5.2%	22.9%	21.0%	14.2%	7.7%	11.4%	7.4%	3.7%	5.3%	1.2%	100.0
Pedestrians	30	133	54	69	37	71	38	42	60	8	542
%	5.5%	24.5%	10.0%	12.7%	6.8%	13.1%	7.0%	7.7%	11.1%	1.5%	100.0
Motorcycle riders	0	22	101	183	128	243	157	61	22	2	919
%	0.0%	2.4%	11.0%	19.9%	13.9%	26.4%	17.1%	6.6%	2.4%	0.2%	100.0
Motorcycle pillion	1	9	9	2	3	3	3	0	0	1	31
%	3.2%	29.0%	29.0%	6.5%	9.7%	9.7%	9.7%	0.0%	0.0%	3.2%	100.0
Bicycle riders	4	230	61	53	59	99	66	32	15	6	625
%	0.6%	36.8%	9.8%	8.5%	9.4%	15.8%	10.6%	5.1%	2.4%	1.0%	100.0
Bicycle pillion	0	4	0	0	0	0	0	0	0	0	4
%	0.0%	100.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	100.0
Total injured	119	797	1258	1179	788	1408	968	645	655	39	7856
% of total	1.5%	10.1%	16.0%	15.0%	10.0%	17.9%	12.3%	8.2%	8.3%	0.5%	100.0

**Table 2E: Road traffic casualties Queensland 2000
by road user type and age group**

Road user type	Females injured by age group										Total
	0-4 years	5-16 years	17-20 years	21-25 years	26-29 years	30-39 years	40-49 years	50-59 years	60 & years	Not stated	
Drivers	0	14	626	576	417	830	654	417	344	1	3879
%	0.0%	0.4%	16.1%	14.8%	10.8%	21.4%	16.9%	10.8%	8.9%	0.0%	100.0
Passengers	94	479	421	295	142	264	232	200	332	29	2488
%	3.8%	19.3%	16.9%	11.9%	5.7%	10.6%	9.3%	8.0%	13.3%	1.2%	100.0
Pedestrians	11	78	38	36	15	36	25	29	70	1	339
%	3.2%	23.0%	11.2%	10.6%	4.4%	10.6%	7.4%	8.6%	20.6%	0.3%	100.0
Motorcycle riders	0	1	8	9	7	19	16	5	2	0	67
%	0.0%	1.5%	11.9%	13.4%	10.4%	28.4%	23.9%	7.5%	3.0%	0.0%	100.0
Motorcycle pillion	0	9	5	6	4	6	7	5	1	0	43
%	0.0%	20.9%	11.6%	14.0%	9.3%	14.0%	16.3%	11.6%	2.3%	0.0%	100.0
Bicycle riders	0	60	15	23	15	26	7	6	4	0	156
%	0.0%	38.5%	9.6%	14.7%	9.6%	16.7%	4.5%	3.8%	2.6%	0.0%	100.0
Bicycle pillion	0	0	0	0	0	0	0	0	0	0	0
%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	100.0
Total injured	105	641	1113	945	600	1181	941	662	753	31	6972
% of total	1.5%	9.2%	16.0%	13.6%	8.6%	16.9%	13.5%	9.5%	10.8%	0.4%	100.0

**Table 2F: Road traffic casualties Queensland 2000
by road user type and age group***

Road user type	Persons injured by age group										Total
	0-4 years	5-16 years	17-20 years	21-25 years	26-29 years	30-39 years	40-49 years	50-59 years	60 & years	Not stated	
Drivers	0	42	1320	1218	854	1638	1238	867	816	4	7997
%	0.0%	0.5%	16.5%	15.2%	10.7%	20.5%	15.5%	10.8%	10.2%	0.1%	100.0
Passengers	178	850	760	525	266	448	352	260	418	48	4105
%	4.3%	20.7%	18.5%	12.8%	6.5%	10.9%	8.6%	6.3%	10.2%	1.2%	100.0
Pedestrians	41	211	92	105	52	107	63	71	130	9	881
%	4.7%	24.0%	10.4%	11.9%	5.9%	12.1%	7.2%	8.1%	14.8%	1.0%	100.0
Motorcycle riders	0	23	109	192	135	262	173	66	24	2	986
%	0.0%	2.3%	11.1%	19.5%	13.7%	26.6%	17.5%	6.7%	2.4%	0.2%	100.0
Motorcycle pillion	1	18	14	8	7	9	10	5	1	1	74
%	1.4%	24.3%	18.9%	10.8%	9.5%	12.2%	13.5%	6.8%	1.4%	1.4%	100.0
Bicycle riders	4	290	76	76	74	125	73	38	19	6	781
%	0.5%	37.1%	9.7%	9.7%	9.5%	16.0%	9.3%	4.9%	2.4%	0.8%	100.0
Bicycle pillion	0	4	0	0	0	0	0	0	0	0	4
%	0.0%	100.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	100.0
Total injured	224	1438	2371	2124	1388	2589	1909	1307	1408	70	14828
% of total	1.5%	9.7%	16.0%	14.3%	9.4%	17.5%	12.9%	8.8%	9.5%	0.5%	100.0

* Includes casualties of unknown gender

Table 3A: Road traffic casualties Queensland 2000
by road user type, age group and sex: persons killed

Age group	Drivers			Motor cyclists			Pedal cyclists		
	Male	Female	Not stated	Male	Female	Not stated	Male	Female	Not stated
0-4 years	0	0	0	0	0	0	0	0	0
5-16 years	1	0	0	1	0	0	2	0	0
17-20 years	14	5	0	2	0	0	0	0	0
21-25 years	12	6	0	6	0	0	0	0	0
26-29 years	14	6	0	3	1	0	1	0	0
30-34 years	16	1	0	8	0	0	0	0	0
35-39 years	16	1	0	4	1	0	1	0	0
40-49 years	13	7	0	5	0	0	1	0	0
50-59 years	15	5	0	2	0	0	1	0	0
60 years & over	18	7	0	0	0	0	0	0	0
Not stated	0	0	0	0	0	0	0	0	0
Total killed	119	38	0	31	2	0	6	0	0

Age group	Pedestrians			Passengers			Total		
	Male	Female	Not stated	Male	Female	Not stated	Male	Female	Not stated
0-4 years	1	0	0	2	4	0	3	4	0
5-16 years	2	0	0	11	4	0	17	4	0
17-20 years	3	1	0	4	2	0	23	8	0
21-25 years	4	0	0	13	3	0	35	9	0
26-29 years	0	0	0	2	0	0	20	7	0
30-34 years	2	0	0	1	1	0	27	2	0
35-39 years	0	2	0	3	2	0	24	6	0
40-49 years	5	1	0	3	3	0	27	11	0
50-59 years	4	0	0	0	2	0	22	7	0
60 years & over	8	7	0	10	12	0	36	26	0
Not stated	0	0	0	0	0	0	0	0	0
Total killed	29	11	0	49	33	0	234	84	0

Table 3B: Road traffic casualties Queensland 2000
by road user type, age group and sex: persons injured

Age group	Drivers			Motor cyclists			Pedal cyclists		
	Male	Female	Not stated	Male	Female	Not stated	Male	Female	Not stated
0-4 years	0	0	0	1	0	0	4	0	0
5-16 years	28	14	0	31	10	0	234	60	0
17-20 years	694	626	0	110	13	0	61	15	0
21-25 years	642	576	0	185	15	0	53	23	0
26-29 years	437	417	0	131	11	0	59	15	0
30-34 years	424	388	0	149	18	0	35	8	0
35-39 years	341	394	0	116	12	0	38	13	0
40-49 years	584	654	0	160	23	0	66	7	0
50-59 years	450	417	0	61	10	0	32	6	0
60 years & over	472	344	0	22	3	0	15	4	0
Not stated	3	1	4	3	0	0	6	0	0
Total injured	4075	3831	4	969	115	0	603	151	0

Age group	Pedestrians			Passengers			Total		
	Male	Female	Not stated	Male	Female	Not stated	Male	Female	Not stated
0-4 years	30	11	0	84	94	0	119	105	0
5-16 years	133	78	0	371	479	0	797	641	0
17-20 years	54	38	0	339	421	0	1258	1113	0
21-25 years	69	36	0	230	295	0	1179	945	0
26-29 years	37	15	0	124	142	0	788	600	0
30-34 years	35	15	0	103	115	0	746	544	0
35-39 years	34	19	0	70	100	0	599	538	0
40-49 years	38	25	0	120	232	0	968	941	0
50-59 years	42	29	0	60	200	0	645	662	0
60 years & over	60	70	0	86	332	0	655	753	0
Not stated	8	1	0	19	29	11	39	21	15
Total injured	540	337	0	1606	2439	11	7793	6863	15

Table 4A: Road traffic casualties Queensland 2000
Restraint details by age group: persons killed

Restraint details	0 - 4 years	5 - 16 years	17 - 20 years	21 - 25 years	26 - 29 years	30 - 39 years	40 - 49 years	50 - 59 years	60 years & over	Not stated	Total
Fitted:											
Worn	4	5	15	11	7	18	13	16	26	0	115
Not worn	1	4	5	7	8	11	6	4	6	0	52
Unknown if worn	0	3	4	7	5	9	5	2	5	0	40
Not fitted	1	3	0	1	0	1	0	0	0	0	6
Unknown	0	1	1	8	2	2	2	0	8	0	24
Not applicable	1	5	6	10	5	18	12	7	17	0	81
Total killed	7	21	31	44	27	59	38	29	62	0	318

Table 4B: Road traffic casualties Queensland 2000
Restraint details by age group: persons injured

Restraint details	0 - 4 years	5 - 16 years	17 - 20 years	21 - 25 years	26 - 29 years	30 - 39 years	40 - 49 years	50 - 59 years	60 years & over	Not stated	Total
Fitted:											
Worn	155	682	1684	1381	863	1657	1320	966	1059	32	9799
Not worn	6	61	58	71	50	87	45	32	26	2	438
Unknown if worn	5	53	153	154	98	155	100	65	82	16	881
Not fitted	4	29	25	13	13	31	19	5	13	1	153
Unknown	7	56	154	118	92	144	98	57	49	21	796
Not applicable	47	557	298	387	272	515	327	182	179	23	2787
Total injured	224	1438	2372	2124	1388	2589	1909	1307	1408	95	14854

Table 5A: Road traffic casualties Queensland 2000
Seat belt usage by age group: persons killed

Age group	Total killed *	Unknown seat belt usage	Unrestrained	Restrained
0-4	5	0	2	3
5-11	3	0	2	1
12-16	7	3	2	2
17-20	25	5	5	15
21-24	23	11	4	8
25-29	24	7	10	7
30-34	14	3	3	8
35-39	18	4	6	8
40-49	24	7	4	13
50-59	21	2	4	15
60-69	12	3	1	8
70-79	19	8	3	8
80+	13	2	2	9
Not stated	0	0	0	0
Total	208	55	48	105

Table 5B: Road traffic casualties Queensland 2000
Seat belt usage by age group: persons injured

Age group	Total seriously injured *	Unknown seat belt usage	Unrestrained	Restrained
0-4	124	9	8	107
5-11	244	17	28	199
12-16	340	57	35	248
17-20	1433	228	63	1142
21-24	920	149	45	726
25-29	901	161	43	697
30-34	666	88	42	536
35-39	648	100	46	502
40-49	1057	129	42	886
50-59	734	84	24	626
60-69	453	49	15	389
70-79	332	36	4	292
80+	129	19	4	106
Not stated	34	20	2	12
Total	8015	1146	401	6468

* Does not include occupants of buses or tractors

Table 6: Road traffic casualties Queensland 2000
Seat belt and helmet wearing details by injury severity

Road user type/safety device used	Killed	Seriously injured	Other injury	Total
Driver:				
Restraint worn	77	4610	1991	6678
Fitted but not worn	38	187	49	274
No restraint fitted	1	29	6	36
Not stated	39	769	331	1139
Sub total driver	155	5595	2377	8127
Passenger:				
Restraint worn	38	2320	878	3236
Fitted but not worn	14	175	27	216
No restraint fitted	5	93	25	123
Not stated	25	470	107	602
Sub total passenger	82	3058	1037	4177
Total vehicle occupants	237	8653	3414	12304
Pedal cycle rider & pillion:				
Helmet worn	4	476	113	593
No helmet worn	1	108	19	128
Not stated	1	44	25	70
Total pedal cycle rider & pillion	6	628	157	791
Motorcycle cycle rider & pillion:				
Helmet worn	29	826	142	997
No helmet worn	1	24	4	29
Not stated	3	49	19	71
Total motor cycle rider & pillion	33	899	165	1097

Table 7: Road traffic casualties Queensland 2000
by road user type and most severe injury sustained: persons killed

Nature of injury	Drivers*	Motor cyclists	Pedal cyclists	Pedestrians	Passengers**	Other	TOTAL
Fractures							
Skull & Face	9	2	0	0	4	0	15
Spine & Trunk	5	1	0	0	4	0	10
Upper Limbs	0	0	0	0	0	0	0
Lower Limbs & Mult	0	0	0	0	0	0	0
Sub-Total	14	3	0	0	8	0	25
Lacerations							
Head & Face	0	0	0	0	0	0	0
Neck & Trunk	0	0	0	0	0	0	0
Upper Limbs	0	0	0	0	0	0	0
Lower Limbs	0	0	0	0	0	0	0
Sub-Total	0	0	0	0	0	0	0
Other							
Intracranial	36	8	2	15	28	0	89
Concussion	0	0	0	0	0	0	0
Internal	96	19	4	23	43	0	185
Nerve/Spinal Cord Injury	0	0	0	0	0	0	0
Crush Injury	2	0	0	0	0	0	2
Blood Vessel Injury	6	0	0	2	5	0	13
Foreign Matter in Orifice	0	0	0	0	0	0	0
Burn	1	0	0	0	0	0	1
Dislocation	0	0	0	0	0	0	0
Sprain/Strain	0	0	0	0	0	0	0
Abrasions	0	0	0	0	0	0	0
Contusion	0	0	0	0	0	0	0
Shock	0	0	0	0	0	0	0
Other	2	0	0	0	1	0	3
Sub-total	143	27	6	40	77	0	293
Total fatalities	157	30	6	40	85	0	318

* Includes horse riders

** Includes pillion passengers

Table 8A: Road traffic crashes Queensland 2000
Involved controllers by road user type and age group: males only

Age group	Driver		Motorcyclist		Bicyclist	
	Inv	Resp	Inv	Resp	Inv	Resp
0-4	1	0	0	0	4	3
5-7	0	0	0	0	15	14
8-12	2	1	3	3	88	73
13-15	49	47	15	12	108	75
16-19	2784	2002	88	56	73	47
20-24	3109	1891	186	112	60	29
25-29	2530	1383	181	101	68	21
30-34	1924	933	150	80	57	14
35-39	1808	816	114	56	44	7
40-49	2991	1301	172	82	68	26
50-59	2224	960	69	44	33	14
60-69	1154	573	17	10	10	6
70+	915	631	5	4	6	5
Not stated	211	165	5	4	7	5
Total	19702	10703	1005	564	641	339

Age group	Pedestrian		Other road user		Total	
	Inv	Resp	Inv	Resp	Inv	Resp
0-4	31	20	0	0	36	23
5-7	34	31	0	0	49	45
8-12	57	46	0	0	150	124
13-15	32	25	0	0	204	161
16-19	58	38	6	4	3009	2230
20-24	72	51	7	6	3434	2217
25-29	49	32	16	6	2844	1665
30-34	40	17	20	8	2191	1156
35-39	33	19	15	8	2014	995
40-49	44	21	33	20	3308	1569
50-59	46	23	34	20	2406	1180
60-69	28	9	11	6	1220	653
70+	40	18	4	3	970	678
Not stated	9	9	0	0	232	190
Total	573	359	146	81	22067	12886

Legend:

Inv - Number of controllers* involved in a crash

Resp - The controller considered most responsible for the crash by police

* Controller - see definitions, Appendix 1

Table 8B: Road traffic crashes Queensland 2000
Involved controllers by road user type and age group: females only

Age group	Driver		Motorcyclist		Bicyclist	
	Inv	Resp	Inv	Resp	Inv	Resp
0-4	1	1	0	0	0	0
5-7	0	0	0	0	5	4
8-12	1	1	0	0	30	26
13-15	11	10	1	1	16	8
16-19	1495	980	2	1	22	10
20-24	1735	896	14	6	21	9
25-29	1471	649	9	7	22	0
30-34	1185	487	11	8	16	3
35-39	1270	526	9	5	10	2
40-49	2010	853	17	6	7	1
50-59	1155	523	5	4	6	2
60-69	527	316	2	2	2	0
70+	418	290	0	0	2	0
Not stated	63	46	0	0	0	0
Total	11342	5578	70	40	159	65

Age group	Pedestrian		Other road user		Total	
	Inv	Resp	Inv	Resp	Inv	Resp
0-4	11	11	0	0	12	12
5-7	18	15	0	0	23	19
8-12	27	21	0	0	58	48
13-15	27	15	0	0	55	34
16-19	41	25	0	0	1560	1052
20-24	34	11	3	3	1807	962
25-29	22	8	1	1	1525	704
30-34	16	5	2	1	1230	546
35-39	22	8	1	0	1312	586
40-49	26	11	2	2	2062	928
50-59	29	8	1	1	1196	567
60-69	25	10	0	0	556	337
70+	52	23	2	2	474	318
Not stated	0	0	0	0	63	48
Total	350	171	12	10	11933	6161

Legend:

Inv - Number of controllers* involved in a crash

Resp - The controller considered most responsible for the crash by police

* Controller - see definitions, Appendix 1

Table 8C: Road traffic crashes Queensland 2000
Involved controllers by road user type and age group: persons only

Age group	Driver		Motorcyclist		Bicyclist	
	Inv	Resp	Inv	Resp	Inv	Resp
0-4	2	1	2	2	1	0
5-7	0	0	0	0	20	18
8-12	3	2	3	3	118	99
13-15	60	57	16	13	124	83
16-19	4279	2982	90	57	95	57
20-24	4844	2787	200	118	81	38
25-29	4001	2032	190	108	90	21
30-34	3109	1420	161	88	73	17
35-39	3078	1342	123	61	54	9
40-49	5001	2154	189	88	75	27
50-59	3379	1483	74	48	39	16
60-69	1681	889	19	12	12	6
70+	1333	921	5	4	8	5
Not stated	274	211	5	4	7	5
Total	31044	16281	1075	604	800	404

Age group	Pedestrian		Other road user		Total	
	Inv	Resp	Inv	Resp	Inv	Resp
0-4	42	31	2	2	1	0
5-7	52	46	0	0	72	64
8-12	84	67	0	0	208	172
13-15	59	40	0	0	259	195
16-19	99	63	6	4	4569	3282
20-24	106	62	10	9	5241	3179
25-29	71	40	17	7	4369	2369
30-34	56	22	22	9	3421	1702
35-39	55	27	16	8	3326	1581
40-49	70	32	35	22	5370	2497
50-59	75	31	35	21	3602	1747
60-69	53	19	11	6	1776	990
70+	92	41	6	5	1444	996
Not stated	9	9	0	0	295	238
Total	923	530	158	91	34000	19047

Legend:

Inv - Number of controllers* involved in a crash

Resp - The controller considered most responsible for the crash by police

* Controller - see definitions, Appendix 1

**Table 9A: Blood alcohol analysis Queensland 2000
Controllers* killed in road traffic crashes**

Blood alcohol analysis	Drivers	Motor cyclists	Pedal cyclists	Pedestrians	Other	Total
No blood analysis	21	1	1	11	0	34
Negative	88	18	5	16	0	127
Positive						
.01 - .04	12	1	0	1	0	14
.05 - .07	2	0	0	1	0	3
.08 - .14	8	3	0	1	0	12
.15 - .19	8	3	0	1	0	12
.20 - .24	10	2	0	6	0	18
.25 & over	8	2	0	3	0	13
Total positive	48	7	0	17	0	52
Total controllers	157	26	6	44	0	213
Total tested	136	25	5	33	0	179
% positive	35.3	28.0	0.0	51.5	0.0	29.1

**Table 9B: Blood alcohol analysis Queensland 2000
Controllers* injured in road traffic crashes**

Blood alcohol analysis	Drivers	Motor cyclists	Pedal cyclists	Pedestrians	Other	Total
No test required	4350	593	703	850	2	6498
Refused test	23	4	1	0	0	28
Negative	3148	343	72	29	1	3593
Positive						
.01 - .04	41	5	0	0	0	46
.05 - .07	47	4	0	0	0	51
.08 - .14	156	20	0	2	0	178
.15 - .19	140	10	2	0	0	152
.20 - .24	61	6	1	1	0	69
.25 & over	31	1	2	0	0	34
Total positive	476	46	5	3	0	530
Total controllers	7997	986	781	882	3	10649
Total tested	3624	389	77	32	0	4123
% positive	13.1	11.8	6.5	9.4	0.0	12.9

* Controller - for definition see Glossary, Appendix 1

Table 10A: Blood alcohol analysis by age group Queensland 2000
Controllers* killed in road traffic crashes

Blood alcohol analysis	Under 17 years	17 - 20 years	21 - 24 years	25 - 29 years	30 - 39 years	40 - 49 years	50 years & over	Total
Failure to supply	0	0	0	0	0	0	0	0
Negative	4	11	15	11	24	15	47	127
Positive	2	17	12	6	19	10	36	102
.01 - .04	0	4	2	3	1	1	3	14
.05 - .07	1	1	0	1	0	0	0	3
.08 - .14	0	4	1	1	5	0	1	12
.15 - .19	0	0	1	2	5	3	1	12
.20 - .24	0	1	3	1	6	6	1	18
.25 & over	0	0	2	1	4	4	2	13
Total positive	1	10	9	9	21	14	8	72
Total tested for alcohol	5	21	24	20	45	29	55	199
% positive	20.0	47.6	37.5	45.0	46.7	48.3	14.5	36.2

* Controller - for definition see Glossary, Appendix 1

Table 10B: Blood alcohol analysis by age group Queensland 2000
Controllers* not killed but may have been injured in road traffic crashes

Blood alcohol analysis	Under 17 years	17 - 20 years	21 - 24 years	25 - 29 years	30 - 39 years	40 - 49 years	50 years & over	Total
Failure to supply	3	8	12	15	19	9	3	69
Negative	123	2782	2251	1491	2930	2344	2929	14851
Positive								
.01 - .04	4	35	24	15	25	16	17	136
.05 - .07	8	40	32	17	23	9	11	140
.08 - .14	4	117	111	58	97	48	25	460
.15 - .19	2	66	85	56	67	40	21	337
.20 - .24	1	15	30	20	39	28	8	141
.25 & over	0	12	18	9	20	23	17	99
Total positive	19	285	300	175	271	164	99	1313
Total tested for alcohol	142	3067	2551	1666	3201	2508	3028	16164
% positive	13.4	9.3	11.8	10.5	8.5	6.5	3.3	8.1

* Controller - for definition see Glossary, Appendix 1

Table 11A: Road traffic crashes Queensland 2000
Time of day and day of week - Total crashes

Time	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	Sunday	Total
Midnight - 2am	39	46	58	68	63	174	170	618
2am - 4am	46	33	44	38	49	134	125	469
4am - 6am	78	58	64	66	94	122	118	600
6am - 8am	248	247	240	239	243	122	101	1440
8am - 10am	380	378	386	375	354	231	194	2298
10am - noon	309	286	323	350	332	370	294	2264
Noon - 2pm	268	277	294	319	342	380	298	2178
2pm - 4pm	410	416	424	468	494	281	301	2794
4pm - 6pm	435	414	454	516	520	327	289	2955
6pm - 8pm	212	253	268	295	344	264	219	1855
8pm - 10pm	119	141	156	192	264	199	135	1206
10pm - midnight	93	90	108	147	193	207	117	955
Total	2637	2639	2819	3073	3292	2811	2361	19632

Table 11B: Road traffic crashes Queensland 2000
Time of day and day of week - Casualty crashes

Time	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	Sunday	Total
Midnight - 2am	17	24	27	36	31	96	93	324
2am - 4am	22	14	18	18	20	74	66	232
4am - 6am	45	25	36	34	46	79	64	329
6am - 8am	141	140	133	141	142	58	63	818
8am - 10am	241	239	241	225	220	134	136	1436
10am - noon	174	161	187	195	185	221	185	1308
Noon - 2pm	161	166	183	179	200	238	185	1312
2pm - 4pm	243	267	267	274	288	181	180	1700
4pm - 6pm	258	254	263	302	288	186	173	1724
6pm - 8pm	114	139	160	175	199	150	116	1053
8pm - 10pm	56	83	79	112	134	99	62	625
10pm - midnight	52	42	50	88	99	116	63	510
Total	1524	1554	1644	1779	1852	1632	1386	11371

Table 11C: Road traffic crashes Queensland 2000
Time of day and day of week - Persons killed

Time	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	Sunday	Total
Midnight - 2am	0	1	2	4	3	3	4	17
2am - 4am	4	0	0	4	2	5	6	21
4am - 6am	0	0	2	2	3	10	2	19
6am - 8am	4	3	3	2	9	3	1	25
8am - 10am	7	5	4	4	2	2	1	25
10am - noon	3	5	4	4	4	4	3	27
Noon - 2pm	3	2	1	5	3	6	5	25
2pm - 4pm	4	3	5	6	12	2	0	32
4pm - 6pm	8	7	9	5	6	8	8	51
6pm - 8pm	1	9	3	5	7	4	3	32
8pm - 10pm	1	2	3	3	6	4	6	25
10pm - midnight	1	3	0	3	2	5	5	19
Total	36	40	36	47	59	56	44	318

Table 11D: Road traffic crashes Queensland 2000
Time of day and day of week - Persons injured

Time	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	Sunday	Total
Midnight - 2am	25	33	34	42	36	127	122	419
2am - 4am	23	16	23	18	26	92	74	272
4am - 6am	53	37	47	34	59	109	87	426
6am - 8am	170	178	157	171	172	83	71	1002
8am - 10am	315	312	302	283	268	171	184	1835
10am - noon	215	212	263	279	247	293	278	1787
Noon - 2pm	216	199	230	227	253	326	256	1707
2pm - 4pm	330	325	333	340	369	247	256	2200
4pm - 6pm	345	321	314	365	380	254	249	2228
6pm - 8pm	162	183	196	219	278	246	166	1450
8pm - 10pm	68	103	100	156	183	138	85	833
10pm - midnight	61	48	66	126	150	163	81	695
Total	1983	1967	2065	2260	2421	2249	1909	14854

Table 12: Road traffic casualties Queensland 2000
Road users by vehicle type and injury severity

Road user type	Killed	Admitted to hospital	Medical treatment	Other injury	Total casualties
Driver					
Car, station wagon	107	1737	2788	1918	6550
Utility, panel van	26	255	362	280	923
4-wheel drive	16	126	148	124	414
Rigid truck	4	45	36	39	124
Articulated truck	2	45	30	12	89
Road train/Bdouble/triple	0	11	11	7	29
Bus	0	8	12	7	27
Other motor vehicle	2	8	12	5	27
Sub-total	157	2235	3399	2392	8183
Motorcycle rider	30	482	355	154	1021
Pedal cycle rider	6	275	350	157	788
Other/not stated	0	3	0	0	3
Sub-total	36	760	705	311	1812
Passenger:					
Car, station wagon	60	971	1422	865	3318
Utility, panel van	5	139	188	77	409
4-wheel drive	10	107	107	59	283
Rigid truck	2	7	9	11	29
Articulated truck	2	3	2	0	7
Road train/Bdouble/triple	1	4	0	1	6
Bus	2	40	81	25	148
Other motor vehicle	0	5	5	0	10
Sub-total	82	1276	1814	1038	4210
Motorcycle pillion	3	37	27	13	80
Pedal cycle pillion	0	2	2	0	4
Other/not stated	0	1	0	0	1
Sub-total	3	40	29	13	85
Pedestrian sub-total	40	423	340	122	925
Total casualties	318	4734	6287	3876	15215

Table 13: Road traffic crashes Queensland 2000
Type of unit most responsible by crash severity

Type of unit	Crash severity								All crashes	%
	F	%	H	%	M	%	O	%		
Car/station wagon	139	50	2208	59	3119	67	1911	71	13621	69
Utility, panel van	35	13	369	10	504	11	251	9	2166	11
Rigid truck	7	3	72	2	113	2	81	3	503	3
Articulated vehicle	7	3	68	2	72	2	36	1	337	2
Omnibus	3	1	27	1	51	1	21	1	150	1
Motorcycle	24	9	321	9	189	4	61	2	606	3
Tractor	2	1	15	0	12	0	18	1	89	0
Towed device (Caravan)	0	0	0	0	2	0	1	0	16	0
Bicycle	5	2	174	5	156	3	68	3	404	2
Pedestrian	31	11	278	7	166	4	53	2	528	3
Animal - ridden	0	0	4	0	0	0	0	0	5	0
Animal - stock	0	0	0	0	0	0	0	0	0	0
Animal - other	0	0	0	0	0	0	0	0	0	0
Railway rolling stock	0	0	0	0	0	0	0	0	0	0
4-wheel drive	20	7	212	6	247	5	166	6	1088	6
Road train/Bdouble/triple	2	1	15	0	10	0	9	0	84	0
Other	0	0	0	0	0	0	0	0	0	0
Not stated	1	0	4	0	4	0	5	0	32	0
Total number of crashes	276	101	3767	100	4645	99	2681	100	19629	100

Type of unit	Injury severity								Total casualties	%
	K	%	HI	%	MI	%	Mm	%		
Car/station wagon	168	53	2872	61	4296	69	2799	72	10135	67
Utility, panel van	37	12	474	10	676	11	374	10	1561	10
Rigid truck	7	2	91	2	161	3	112	3	371	2
Articulated vehicle	8	3	74	2	87	1	49	1	218	1
Omnibus	4	1	63	1	102	2	35	1	204	1
Motorcycle	26	8	347	7	217	3	73	2	663	4
Tractor	2	1	20	0	14	0	21	1	57	0
Towed device (Caravan)	0	0	0	0	3	0	1	0	4	0
Bicycle	5	2	179	4	160	3	81	2	425	3
Pedestrian	31	10	287	6	177	3	58	2	553	4
Animal - ridden	0	0	4	0	0	0	0	0	4	0
Animal - stock	0	0	0	0	0	0	0	0	0	0
Animal - other	0	0	0	0	0	0	0	0	0	0
Railway rolling stock	0	0	0	0	0	0	0	0	0	0
4-wheel drive	27	8	292	6	353	6	246	6	918	6
Road train/Bdouble/triple	2	1	19	0	13	0	9	0	43	0
Other	0	0	0	0	0	0	0	0	0	0
Not stated	1	0	4	0	5	0	5	0	15	0
Total number of crashes	318	100	4726	100	6264	100	3863	100	15171	100

Table 14: Single vehicle crashes Queensland 2000 by vehicle type and crash severity

Vehicle type	Fatal crashes	Serious injury	Other injury	Property damage only	Total crashes
Car/station wagon	71	1757	415	2352	4595
Utility/panel van	19	303	67	370	759
Truck	5	50	11	83	149
Articulated vehicle	4	70	8	63	145
Omnibus	0	18	2	9	29
Motor cycle	18	316	34	3	371
Bicycle	1	57	10	0	68
4-wheel drive	16	178	54	170	418
Road train/Bdouble/triple	1	18	5	34	58
Other vehicle	2	12	4	22	40
Total crashes	137	2779	610	3106	6632

Table 15: Road traffic crashes and casualties, Queensland 2000:
by roadway feature and traffic control

	Road feature/traffic control	Total crashes	Casualty crashes	Persons killed	Persons injured
Intersection					
Cross roads controlled by:	- person	6	4	0	6
	- traffic lights	1854	1052	13	1415
	-stop/give way signs	1203	648	8	944
	- pedestrian crossing	18	13	0	13
Uncontrolled cross roads		621	357	10	486
T-junction controlled by:	- person	8	5	0	6
	- traffic lights	904	558	6	744
	-stop/give way signs	802	473	7	612
	- pedestrian crossing	25	20	0	25
Uncontrolled T-junction		2426	1421	14	1817
Y-junction controlled by:	- person	0	0	0	0
	- traffic lights	4	2	0	2
	-stop/give way signs	4	3	0	5
	- pedestrian crossing	0	0	0	0
Uncontrolled Y-junction		17	12	0	13
Other intersections controlled by:	- person	0	0	0	0
	- traffic lights	142	76	0	111
	-stop/give way signs	730	435	3	501
	- pedestrian crossing	2	2	0	2
Uncontrolled other intersection		269	120	5	148
Railway level crossing controlled by:	- lights	12	7	2	5
	- signs	4	2	0	2
Uncontrolled railway level crossing		12	8	0	8
Other roadway features					
Bridge, culvert, causeway		291	170	10	241
Forestry/National Park Road		12	5	0	7
Bikeway		2	2	0	2
Straight road:	- median opening	31	16	0	21
	- merge lane	41	20	1	21
	- person	19	12	0	13
	- lights	51	35	2	41
	- signs	43	23	0	31
	- pedestrian crossing	75	58	1	67
No features		7348	4221	133	5437
Curved road:	- view open	1862	1131	82	1462
	- view obscured	842	496	21	691
Total crashes		19680	11407	318	14899

Table 16A: Road traffic crashes Queensland 2000
Roadway features by crash severity

Road way feature	Crash severity					Total
	Fatal	Admitted to hospital	Received medical treatment	Other injury	Non-injury	
Cross	30	606	892	537	1626	3691
T junction	25	793	1043	610	1686	4157
Y junction	0	5	9	3	8	25
Multiple road	0	4	9	1	18	32
Interchange	4	62	91	55	208	420
Roundabout	3	106	176	119	285	689
Bridge, causeway	8	59	62	40	122	291
Railway crossing	2	7	7	1	11	28
Median opening	0	1	8	7	15	31
Merge lane	1	6	6	7	21	41
Bikeway	0	2	2	1	7	12
Forestry/National park road	0	2	0	0	0	2
Miscellaneous	0	0	0	0	0	0
No special features	203	2115	2341	1300	4254	10213
Total crashes	276	3768	4646	2681	8261	19632

Table 16B: Road traffic crashes Brisbane Statistical Division 2000
Roadway features by crash severity

Road way feature	Crash severity					Total
	Fatal	Admitted to hospital	Received medical treatment	Other injury	Non-injury	
Cross	6	249	382	242	661	1540
T junction	10	385	564	364	880	2203
Y junction	0	1	5	3	3	12
Multiple road	0	2	6	1	9	18
Interchange	2	44	61	44	149	300
Roundabout	1	30	65	67	105	268
Bridge, causeway	1	11	19	13	32	76
Railway crossing	0	0	1	0	0	1
Median opening	0	1	6	4	10	21
Merge lane	0	4	2	4	11	21
Miscellaneous	0	0	0	0	0	0
No special features	48	669	922	596	1637	3872
Total crashes	68	1396	2033	1338	3497	8332

**Table 17: Road traffic crashes and casualties Queensland 2000
by region, crash severity and gender**

Crashes and casualties	Brisbane City	Rest of BSD*	Provincial cities	Rest of Qld	Total Qld
Crashes					
Fatal crashes	33	35	72	136	276
Serious injury crashes	874	522	1138	1241	3775
Other injury crashes	2277	1094	2168	1817	7356
Total casualty crashes	3184	1651	3378	3194	11407
Property damage only crashes	2352	1145	2387	2389	8273
Total crashes	5536	2796	5765	5583	19680
Casualties					
Fatalities					
Males	28	31	62	113	234
Females	7	7	21	49	84
Not stated	0	0	0	0	0
Total fatalities	35	38	83	162	318
Seriously injured					
Males	1422	799	1743	1850	5814
Females	1302	804	1528	1563	5197
Not stated	5	1	0	6	12
Total seriously injured	2729	1604	3271	3419	11023
Other injured					
Males	701	298	553	512	2064
Females	611	266	517	404	1798
Not stated	6	1	5	2	14
Total other injured	1318	565	1075	918	3876
Total casualties					
Males	2151	1128	2358	2475	8112
Females	1920	1077	2066	2016	7079
Not stated	11	2	5	8	26
Total casualties	4082	2207	4429	4499	15217

* Brisbane Statistical Division

**Table 18: Road traffic crashes and casualties Queensland 2000
by Local Government Area**

Local Government Area	Crashes		Persons										
	Total reported	Involving casualties	Drivers and passengers		Pedestrians		Motorcycle riders and pillion		Pedal cycle riders		Others		
			K	I	K	I	K	I	K	I	K	I	
Aramac Shire Council	6	3	0	3	0	0	0	1	0	0	0	0	0
Atherton Shire Council	40	25	0	44	0	1	0	1	0	2	0	0	0
Balonne Shire Council	38	25	3	20	0	4	0	2	0	1	0	0	0
Banana Shire Council	96	58	1	55	0	3	0	5	0	7	0	0	0
Barcaldine Shire Council	10	6	0	7	0	0	0	1	0	0	0	0	0
Barcoo Shire Council	8	5	1	4	0	0	0	2	0	0	0	0	0
Bauhinia Shire Council	18	14	1	15	0	0	0	0	0	1	0	0	0
Beaudesert Shire Council	231	141	3	189	0	2	1	17	0	1	0	0	0
Belyando Shire Council	32	17	0	15	0	1	0	1	0	1	0	0	0
Bendemere Shire Council	9	7	0	11	0	0	0	0	0	0	0	0	0
Biggenden Shire Council	13	4	0	5	0	0	0	0	0	0	0	0	0
Blackall Shire Council	8	7	0	6	0	2	0	1	0	0	0	0	0
Boonah Shire Council	63	32	0	38	0	0	1	2	0	1	0	0	0
Booringa Shire Council	12	10	0	14	0	0	0	0	0	0	0	0	0
Boulia Shire Council	8	6	0	16	0	0	0	0	0	0	0	0	0
Bowen Shire Council	58	34	0	33	0	2	0	4	0	1	0	0	0
Brisbane City Council	5536	3184	20	3290	9	290	6	263	0	186	0	0	0
Broadsound Shire Council	47	29	4	44	0	0	0	1	0	0	0	0	0
Bulloo Shire Council	3	2	0	3	0	0	0	0	0	0	0	0	0
Bundaberg City Council	245	133	1	101	2	15	0	22	0	15	0	0	0
Bungil Shire Council	34	16	0	19	0	0	0	0	0	0	0	0	0
Burdekin Shire Council	101	53	5	63	0	4	0	4	0	2	0	0	0
Burke Shire Council	13	9	1	16	1	0	0	0	0	0	0	0	0
Burnett Shire Council	65	34	3	44	0	2	0	5	0	2	0	0	0
Caboolture Shire Council	561	333	5	351	5	23	0	26	1	25	0	0	0
Cairns City Council	713	386	7	331	1	41	1	41	1	64	0	0	0
Calliope Shire Council	96	59	7	83	1	1	0	4	0	0	0	0	0
Caloundra City Council	428	238	6	265	0	21	0	21	0	15	0	0	0
Cambooya Shire Council	23	11	0	13	0	0	0	0	0	0	0	0	0
Cardwell Shire Council	65	39	1	38	1	3	0	2	0	1	0	0	0
Carpentaria Shire Council	12	5	1	4	0	1	0	0	0	0	0	0	0
Charters Towers City Council	29	14	0	21	0	1	0	0	0	0	0	0	0
Chinchilla Shire Council	28	17	0	25	0	0	0	0	0	0	0	0	0
Clifton Shire Council	8	5	0	5	0	0	0	0	0	0	0	0	0
Cloncurry Shire Council	22	13	1	11	0	2	0	2	0	0	0	0	0
Cook Shire Council	55	45	2	69	0	2	0	3	0	0	0	0	0
Cooloolo Shire Council	239	120	5	149	0	5	0	13	0	3	0	0	0
Crows Nest Shire Council	43	22	2	32	0	2	0	1	0	0	0	0	0
Croydon Shire Council	1	0	0	0	0	0	0	0	0	0	0	0	0
Dalby Town Council	30	17	0	25	0	1	0	3	0	0	0	0	0
Dalrymple Shire Council	57	33	6	49	0	0	1	3	0	0	0	0	0
Diamantina Shire Council	10	8	0	12	0	0	0	1	0	0	0	0	0
Douglas Shire Council	88	46	6	48	1	3	0	6	0	5	0	0	0
Duaringa Shire Council	43	28	1	42	0	0	0	0	0	1	0	0	0
Eacham Shire Council	36	19	2	19	0	1	1	0	0	1	0	0	0
Eidsvold Shire Council	11	9	0	9	0	1	0	0	0	0	0	0	0

**Table 18: Road traffic crashes and casualties Queensland 2000
by Local Government Area (cont'd)**

Local Government Area	Crashes		Persons									
	Total reported	Involving casualties	Drivers and passengers		Pedestrians		Motorcycle riders and pillions		Pedal cycle riders		Others	
			K	I	K	I	K	I	K	I	K	I
Emerald Shire Council	67	43	3	45	1	2	0	2	0	1	0	0
Esk Shire Council	120	70	3	67	0	1	0	18	0	0	0	0
Etheridge Shire Council	26	19	2	23	0	0	0	3	0	0	0	0
Fitzroy Shire Council	53	35	2	46	0	1	0	1	0	0	0	0
Flinders Shire Council	18	8	0	10	0	0	0	1	0	0	0	0
Gatton Shire Council	117	69	11	98	0	2	1	2	0	2	0	0
Gayndah Shire Council	17	10	0	11	0	1	0	2	0	1	0	0
Gladstone City Council	150	84	0	71	1	6	0	13	0	11	0	0
Gold Coast City Council	1956	1325	23	1351	4	141	10	104	1	106	0	0
Goondiwindi Town Council	18	7	0	7	1	0	0	0	0	2	0	0
Herberton Shire Council	23	14	0	28	0	0	0	1	0	0	0	0
Hervey Bay City Council	180	120	2	125	0	4	1	24	0	16	0	0
Hinchinbrook Shire Council	63	35	3	48	0	5	0	1	0	0	0	0
Ilfracombe Shire Council	9	7	0	8	0	0	0	0	0	0	0	0
Inglewood Shire Council	19	8	0	9	0	0	0	0	0	0	0	0
Ipswich City Council	834	395	3	425	2	33	1	28	0	27	0	0
Isis Shire Council	70	41	0	55	0	0	0	5	0	0	0	0
Isisford Shire Council	2	2	0	3	0	0	0	0	0	0	0	0
Jericho Shire Council	11	7	0	7	0	0	0	0	0	0	0	0
Johnstone Shire Council	106	64	0	53	1	5	0	14	0	6	0	0
Jondaryan Shire Council	60	36	4	48	0	1	0	3	0	0	0	0
Kilcoy Shire Council	37	20	1	36	0	0	0	1	0	0	0	0
Kilkivan Shire Council	38	23	1	26	0	0	0	2	0	0	0	0
Kingaroy Shire Council	63	35	0	42	0	1	0	2	0	2	0	0
Kolan Shire Council	41	20	1	32	0	0	0	2	0	0	0	0
Laidley Shire Council	76	47	2	55	1	4	0	5	0	2	0	0
Livingstone Shire Council	110	74	7	97	0	5	0	10	0	6	0	0
Logan City Council	991	548	4	633	1	24	1	46	1	29	0	0
Longreach Shire Council	18	10	0	12	0	1	0	1	0	0	0	0
Mackay City Council	431	253	11	263	1	18	3	23	0	24	0	0
Mareeba Shire Council	110	69	0	71	0	6	0	14	0	3	0	0
Maroochy Shire Council	714	433	13	471	0	35	0	35	0	27	0	0
Maryborough City Council	136	81	0	87	1	6	0	9	0	9	0	0
Mckinlay Shire Council	18	10	1	11	0	0	0	0	0	0	0	0
Millmerran Shire Council	22	10	2	13	0	0	0	0	0	0	0	0
Mirani Shire Council	19	13	1	14	0	0	0	0	0	0	0	0
Miriam Vale Shire Council	34	18	2	24	0	0	0	0	1	0	0	0
Monto Shire Council	13	6	0	5	0	0	0	2	0	0	0	0
Mornington Shire Council	3	3	0	3	0	1	0	0	0	0	0	0
Mount Isa City Council	85	48	3	38	0	8	0	7	0	12	0	0
Mount Morgan Shire Council	9	5	0	4	0	0	1	0	0	0	0	0
Mundubbera Shire Council	18	11	1	12	0	0	0	0	0	0	0	0
Murgon Shire Council	19	14	0	12	0	1	0	1	0	1	0	0
Murilla Shire Council	8	5	1	2	0	1	0	1	0	0	0	0

**Table 18: Road traffic crashes and casualties Queensland 2000
by Local Government Area (cont'd)**

Local Government Area	Crashes		Persons									
	Total reported	Involving casualties	Drivers and passengers		Pedestrians		Motorcycle riders and pillion		Pedal cycle riders		Others	
			K	I	K	I	K	I	K	I	K	I
Murweh Shire Council	26	16	2	18	0	0	0	5	0	1	0	0
Nanango Shire Council	52	31	1	35	0	1	0	3	0	1	0	0
Nebo Shire Council	18	11	0	13	0	0	0	0	0	0	0	0
Noosa Shire Council	210	128	8	130	0	11	0	15	0	12	0	0
Paroo Shire Council	6	3	1	11	0	0	0	0	0	0	0	0
Peak Downs Shire Council	13	9	1	8	0	0	0	1	0	0	0	0
Perry Shire Council	3	1	0	2	0	0	0	0	0	0	0	0
Pine Rivers Shire Council	383	237	3	223	1	25	2	23	0	23	0	0
Pittsworth Shire Council	18	10	1	9	0	0	0	1	0	1	0	0
Quilpie Shire Council	8	4	0	6	0	0	0	0	0	0	0	0
Redcliffe City Council	243	127	2	130	2	11	0	13	0	18	0	0
Redland Shire Council	322	212	1	214	0	16	0	22	0	26	0	0
Richmond Shire Council	10	6	0	9	0	0	0	0	0	0	0	0
Rockhampton City Council	376	173	1	175	0	11	0	21	0	16	0	0
Roma Town Council	20	14	0	19	0	1	0	0	0	1	0	0
Rosalie Shire Council	34	15	0	15	0	0	0	2	0	0	0	0
Sarina Shire Council	58	29	0	31	0	2	1	4	0	2	0	0
Stanthorpe Shire Council	50	22	1	27	0	0	0	1	0	0	0	0
Tambo Shire Council	8	4	1	5	0	0	0	0	0	0	0	0
Tara Shire Council	27	17	1	20	0	0	0	0	0	0	0	0
Taroom Shire Council	23	12	0	17	0	0	0	0	0	0	0	0
Thuringowa City Council	154	94	0	86	0	7	0	15	0	8	0	0
Tiaro Shire Council	28	17	1	21	1	0	0	1	0	0	0	0
Toowoomba City Council	524	259	2	269	0	25	1	26	1	18	0	0
Torres Shire Council	10	6	0	4	0	1	0	1	0	1	0	0
Townsville City Council	515	300	0	272	1	21	0	56	0	34	0	0
Waggamba Shire Council	33	18	4	26	0	0	0	0	0	0	0	0
Wambo Shire Council	30	19	2	25	0	0	0	0	0	0	0	0
Warroo Shire Council	4	2	0	4	0	0	0	0	0	0	0	0
Warwick Shire Council	111	60	2	76	0	2	0	3	0	2	0	0
Whitsunday Shire Council	90	51	0	73	0	4	0	4	0	0	0	0
Winton Shire Council	10	3	0	4	0	0	0	0	0	0	0	0
Wondai Shire Council	20	12	2	14	0	0	0	0	0	0	0	0
Woocoo Shire Council	19	9	0	11	0	0	0	0	0	0	0	0
TOTAL for QUEENSLAND	19680	11407	239	12159	40	885	33	1058	6	786	0	0

K - Killed

I - Injured

**Table 19: Annual road toll, population and vehicles on register
Queensland, 1953 - 2000**

Year	Persons killed						Population ('000)	Motor vehicles ('000)
	Driver*	Motor cyclist	Pedal cyclist	Pedestrian	Passenger	Total killed		
1953	45	60	16	64	91	276	1,298.4	266.2
1954	46	60	18	64	85	273	1,322.8	284.2
1955	55	52	17	76	77	277	1,350.7	307.7
1956	68	43	15	89	108	323	1,378.9	326.6
1957	80	47	30	62	104	323	1,420.5	345.1
1958	92	41	29	89	102	353	1,449.3	365.2
1959	106	32	23	92	100	353	1,477.2	383.8
1960	103	31	17	78	117	346	1,502.3	406.7
1961	102	28	18	91	98	337	1,540.3	321.7
1962	131	32	21	100	119	403	1,562.8	453.3
1963	139	20	32	96	111	398	1,595.4	459.0
1964	164	25	12	115	145	461	1,626.5	497.4
1965	183	18	19	101	146	467	1,659.4	536.1
1966	181	20	20	102	143	466	1,687.1	563.4
1967	201	13	20	110	158	502	1,715.8	588.5
1968	197	16	9	82	173	477	1,747.7	620.9
1969	226	19	18	109	184	556	1,779.7	649.9
1970	223	22	13	111	158	527	1,812.8	686.1
1971	255	44	24	78	193	594	1,874.9	726.5
1972	217	55	18	98	184	572	1,924.7	774.0
1973	219	71	19	121	208	638	1,981.6	827.0
1974	215	83	10	107	174	589	2,033.0	889.7
1975	225	72	22	107	209	635	2,072.3	917.0
1976	196	83	16	89	185	569	2,110.4	1,012.2
1977	215	97	27	92	141	572	2,151.0	1,067.2
1978	237	70	15	92	198	612	2,191.6	1,129.6
1979	242	94	13	95	172	616	2,239.7	1,183.4
1980	211	87	14	87	158	557	2,301.7	1,256.9
1981	237	92	16	66	183	594	2,387.9	1,355.6
1982	255	94	18	71	164	602	2,456.5	1,439.5
1983	178	92	19	61	160	510	2,503.3	1,496.1
1984	192	74	16	66	157	505	2,547.1	1,533.5
1985	201	77	20	72	132	502	2,597.1	1,546.1
1986	186	75#	15#	65	140+	481	2,648.5	1,567.4
1987	165	55	14	73	135	442	2,703.4	1,575.3
1988	225	53	21	78	162	539	2,780.7	1,616.2
1989	173	47	19	68	121	428	2,864.6	1,693.4
1990	153	50	18	65	113	399	2,932.2	1,751.9
1991	163	41	16	66	109	395	2,999.9	1,787.0
1992	167	43	18	75	113	416	3,030.5	1,832.8
1993	189	47	10	49	101	396	3,112.6	1,847.2
1994	177	45	13	79	108	422	3,116.0	1,975.5
1995	180	54	10	92	120	456	3,277.3	2,038.9
1996	174	41	10	55	105	385	3,354.7	2,171.9
1997	159	43	12	59	87	360	3,440.2	2,232.9
1998	122	25	9	48	75	279	3,456.3	2,307.5
1999	128	41	9	49	87	314	3,525.6	2,385.6
2000	157	30	6	40	85	318	3,556.4	2,428.6

* Includes horse riders

Includes pillions from 1986

+ Includes pillions prior to 1986

**Table 20: Annual trend data
Queensland 1991-2000**

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Casualties by severity										
Fatalities	395	416	396	422	456	385	360	279	314	318
Hospitalised	3959	4004	4052	4600	4636	4481	4146	4394	4498	4738
Medical treatment	4826	5473	5876	6207	6692	6836	6483	6321	6243	6290
Minor injury	2493	2926	3131	3587	3932	4131	3928	4008	3835	3876
Total	11673	12819	13455	14816	15716	15833	14917	15002	14890	15222
Fatalities by age group										
0-11 years*	25	26	19	22	25	20	21	17	18	12
12-16 years	17	22	18	18	21	20	17	14	19	16
17-24 years	96	119	122	103	121	107	113	79	77	63
25-59 years	180	172	174	194	208	172	155	121	143	165
60 years and over	77	77	63	85	81	66	54	48	57	62
Total	395	416	396	422	456	385	360	279	314	318
Fatalities by age group: female										
0-11 years*	7	10	9	8	12	8	5	4	8	4
12-16 years	5	5	9	6	8	5	3	6	7	4
17-24 years	24	32	25	29	29	19	39	18	17	13
25-59 years	49	47	40	46	63	55	41	36	36	37
60 years and over	34	33	23	38	32	30	21	17	20	26
Total	119	127	106	127	144	117	109	81	88	84
Fatalities by age group: male										
0-11 years*	18	16	10	14	13	12	16	12	8	8
12-16 years	12	17	9	12	13	15	14	8	12	12
17-24 years	72	87	97	74	92	88	74	61	60	50
25-59 years	131	125	134	148	145	117	114	85	107	128
60 years and over	43	44	40	47	49	36	33	31	37	36
Total	276	289	290	295	312	268	251	197	224	234
Fatalities by road user										
Drivers	162	168	189	177	181	174	158	122	127	157
Passengers	106	113	101	108	119	105	88	75	87	82
Motorcyclists	45	43	47	45	54	41	43	25	41	33
Bicyclists	16	18	10	13	10	10	12	9	9	6
Pedestrians	66	74	49	79	92	55	59	48	49	40
Other	0	0	0	0	0	0	0	0	1	0
Total	395	416	396	422	456	385	360	279	314	318
Fatalities by driver/rider blood alcohol content										
Tested	158	152	182	164	194	170	171	128	121	163
Untested	43	49	50	53	36	41	26	15	42	22
Total	201	201	232	217	230	211	197	143	163	185
Nil	103	96	123	103	112	105	112	86	86	104
0.01 - 0.04	6	4	7	10	18	5	13	8	6	13
0.05 - 0.14	13	18	14	20	20	19	21	15	13	13
0.15 - 0.24	28	25	32	23	31	31	15	14	8	23
0.25 and over	8	9	6	8	13	10	10	5	8	10
Total	158	152	182	164	194	170	171	128	121	163

* May include unknown age of fatality

**Table 20: Annual trend data
Queensland 1991-2000**

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Fatalities by seatbelt usage										
Not determined	82	114	105	89	105	89	88	62	64	64
Restrained	133	120	110	139	141	137	110	97	98	115
Unrestrained	51	44	70	40	46	45	45	34	48	58
Total	266	278	285	268	292	271	243	193	210	237
Fatalities by helmet usage										
Not determined	24	0	1	2	3	5	2	7	3	4
Worn	3	17	5	5	9	11	9	4	9	33
Not worn	34	44	51	51	52	35	44	23	38	2
Total	61	61	57	58	64	51	55	34	50	39
Injuries by age group										
0-11 years	716	790	863	850	930	935	886	858	867	836
12-16 years	809	847	829	899	1035	979	926	954	853	829
17-24 years	3588	3954	4202	4631	4611	4572	4143	4199	4007	4119
25-59 years	4862	5476	5806	6583	7178	7379	7090	7162	7177	7610
60 years and over	1125	1283	1293	1384	1443	1525	1438	1470	1380	1412
Unstated	178	53	66	45	63	58	72	78	73	98
Total	11278	12403	13059	14392	15260	15448	14555	14721	14357	14904
Injuries by age group: female										
0-11 years	335	351	353	373	434	381	366	372	388	363
12-16 years	321	365	358	371	439	437	397	408	364	383
17-24 years	1428	1541	1742	1938	1959	1962	1765	1862	1774	1892
25-59 years	2182	2322	2561	2905	3228	3351	3282	3376	3283	3569
60 years and over	577	656	686	747	725	792	777	756	716	755
Unstated	107	34	30	20	21	24	16	21	30	32
Total	4950	5269	5730	6354	6806	6947	6603	6795	6555	6994
Injuries by age group: male										
0-11 years	381	439	510	477	496	553	520	486	479	473
12-16 years	488	482	471	528	596	542	529	546	489	446
17-24 years	2160	2413	2460	2693	2652	2610	2378	2337	2233	2226
25-59 years	2680	3154	3245	3678	3950	4028	3806	3785	3894	4041
60 years and over	548	627	607	637	718	733	661	714	664	657
Unstated	65	16	23	14	27	26	38	34	43	41
Total	6322	7131	7316	8027	8439	8492	7932	7902	7802	7884
Injuries by road user type										
Drivers	5098	5662	6149	7055	7677	7725	7457	7628	7566	8049
Passengers	3377	3593	3917	4250	4402	4434	4089	4112	4065	4132
Motorcyclists	1168	1278	1340	1374	1357	1396	1204	1220	1100	1072
Bicyclists	866	961	792	784	816	916	913	876	763	788
Pedestrians	757	889	854	918	994	963	884	877	858	887
Other	12	19	6	11	12	12	7	6	5	2
Total	11278	12402	13058	14392	15258	15446	14554	14719	14357	14930

Table 20: Annual trend data

Queensland 1991-2000

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Injuries by blood alcohol content of driver/rider										
Tested	1019	1518	1690	1904	2042	2203	2285	2730	3064	3639
Untested	6135	6511	6568	7317	7814	7820	7274	6888	6360	6113
Total	7154	8029	8258	9221	9856	10023	9559	9618	9424	9752
Nil	612	1071	1220	1374	1477	1595	1773	2239	2578	3138
0.01 - 0.04	21	21	29	32	41	31	33	42	33	45
0.05 - 0.14	155	159	182	200	228	233	228	225	187	222
0.15 - 0.24	195	209	216	257	255	307	223	195	230	214
0.25 and over	36	58	43	41	41	37	28	29	36	20
Total	1019	1518	1690	1904	2042	2203	2285	2730	3064	3639
Injuries by seatbelt usage										
Not determined	1466	1431	1381	1529	1702	1794	1874	1851	1718	1599
Restrained	6330	7141	8019	9101	9685	9684	9045	9224	9310	9249
Unrestrained	499	499	552	508	534	517	482	477	434	550
Total	8295	9071	9952	11138	11921	11995	11401	11552	11462	11398
Injuries by helmet usage										
Not determined	1016	173	75	100	108	129	136	154	130	137
Worn	909	1600	1905	1876	1889	1939	1779	1765	1573	1563
Not worn	121	483	157	193	188	256	209	183	168	156
Total	2046	2256	2137	2169	2185	2324	2124	2102	1871	1856
Crashes by severity										
Fatal	359	363	357	368	408	338	321	257	273	276
Hospitalisation	3041	3232	3204	3612	3654	3559	3328	3514	3529	3779
Medical treatment	3454	3967	4172	4469	4800	4936	4761	4609	4501	4670
Minor injury	1788	2054	2170	2469	2800	2872	2697	2757	2596	2694
Property damage	9526	9551	9667	9912	9602	9208	8236	8419	8543	8335
Total	18168	19167	19570	20830	21264	20913	19343	19556	19442	19754
Fatal crashes - crash nature										
Hit object	85	82	101	93	105	93	95	80	65	79
Hit pedestrian	63	73	44	73	88	55	55	46	47	38
Head-on	53	67	55	62	70	46	48	23	47	47
Angle	69	53	71	60	50	60	54	44	36	34
Overtaken	46	39	53	35	47	45	25	24	27	40
Rear-end	15	17	7	11	16	10	8	8	12	6
Fall from vehicle	8	20	9	10	11	13	11	8	12	12
Sideswipe	15	9	7	10	10	9	16	11	19	13
Hit parked vehicle	1	1	2	6	7	4	3	6	5	6
Hit animal	3	2	7	4	3	3	5	6	1	0
Other	1	0	1	4	1	0	1	1	2	1
Total	359	363	357	368	408	338	321	257	273	276

Table 20: Annual trend data
Queensland 1991-2000

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Fatal crashes - traffic control										
Police	0	1	1	1	0	0	0	0	0	0
Road/Rail worker	0	0	2	0	0	0	0	0	2	0
Operating traffic lights	24	19	14	26	24	23	10	12	13	20
Railway-lights only	3	2	2	2	1	0	1	0	0	1
Railway-lights & boom gate	0	3	0	2	1	0	1	2	0	1
Stop sign	10	9	13	5	9	10	16	9	8	4
Give way sign	14	12	14	14	17	13	10	12	14	11
Railway crossing sign	0	2	3	0	1	4	0	2	0	0
Pedestrian crossing sign	1	6	0	3	5	3	3	1	2	1
Miscellaneous	2	1	0	0	0	0	0	0	0	0
No traffic control	305	308	308	315	350	285	280	219	234	238
Fatal crashes - speed limit										
0-50 km/h	2	3	1	5	3	7	1	6	10	15
60 km/h	148	149	136	148	152	142	115	75	84	78
70-90 km/h	45	44	41	49	46	39	42	46	62	52
100km/h and over	164	167	179	166	207	150	163	130	117	131
Fatal crashes after dark										
Total	149	161	150	154	171	142	152	102	124	112
Fatal crashes - roadway feature										
Wet road	0	0	0	0	0	11	31	48	42	46
Crossroad	41	32	45	36	44	47	27	25	31	30
Roundabout	1	2	0	2	2	3	1	2	0	3
Other intersection	54	58	50	54	59	55	48	31	35	29
Bridge/causeway	15	10	9	12	16	7	12	11	3	8
Fatal crashes - day of week										
Monday	47	53	41	42	45	36	30	31	33	31
Tuesday	35	36	41	43	43	48	44	25	24	36
Wednesday	41	46	45	54	58	34	45	32	29	35
Thursday	44	44	45	50	52	46	42	36	35	41
Friday	66	69	59	65	74	53	56	39	57	47
Saturday	74	67	65	59	67	60	64	55	50	49
Sunday	52	48	61	55	69	61	40	39	45	37
Fatal crashes - location										
Brisbane City	59	57	49	53	58	50	39	34	39	33
Rest of BSD	55	56	53	60	44	39	37	26	33	35
Provincial cities	63	54	66	58	69	79	61	54	46	44
Rest of state	182	196	189	197	237	170	184	143	155	164
Total	359	363	357	368	408	338	321	257	273	276

**Table 20: Annual trend data
Queensland 1991-2000**

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Fatal crashes - contributing factors										
Disobeyed traffic rules	110	107	125	125	128	115	110	73	96	95
Alcohol/drugs	138	107	98	103	132	101	101	86	85	93
Inexperience	26	69	57	82	102	91	95	62	52	41
Speed	52	66	80	51	46	48	51	30	39	46
Other driver conditions	23	45	51	42	50	32	26	31	25	27
Age	30	54	35	36	41	30	28	25	28	33
Rain/wet road	19	47	25	35	41	22	16	29	10	14
Negligence	12	19	15	31	25	14	17	19	19	18
Inattention	31	25	15	24	41	26	26	28	47	38
Road conditions	21	32	35	23	29	26	9	14	14	13
Other	29	48	21	23	41	31	36	22	32	36
Vehicle defects	17	23	21	11	17	13	7	13	14	8
Fatigue	17	14	11	11	12	20	15	10	5	12
No street lighting	27	15	3	6	7	5	9	9	1	4
Fatal crashes - units involved										
Car	325	310	313	335	347	292	286	209	229	210
Utility/van	75	89	72	85	107	84	78	75	73	56
4-wheel drive	N/A	37								
Rigid Truck	38	38	34	31	28	24	24	17	17	31
Articulated Truck	24	34	41	38	49	34	31	29	31	22
Road train/Bdouble	N/A	8								
Bus	12	4	7	7	6	6	2	7	12	5
Motorcycle	45	44	47	46	57	44	44	25	44	34
Tractor	5	3	5	5	7	7	6	3	5	3
Bicycle	16	18	10	12	10	11	12	10	10	6
Towed device	1	0	2	0	0	1	0	1	1	0
Pedestrian	69	79	56	86	96	59	61	48	52	44
Animal - ridden	0	1	1	0	0	0	0	2	0	0
Animal - stock	2	2	5	4	2	2	5	3	1	0
Animal - other	1	0	2	0	1	1	0	2	0	0
Railway stock	5	5	5	4	4	4	3	4	0	2
Other	3	2	0	0	2	0	3	2	8	1
Total	621	629	600	653	716	569	555	437	483	459
Fatal crashes - units towing										
Total	12	15	17	17	25	32	39	37	36	46
Fatal crashes - driver involvement by licence type										
Open	415	404	377	398	408	344	325	251	284	288
Provisional	37	42	59	79	91	64	74	46	57	50
Learner	6	17	7	9	16	14	14	14	14	10
Not licensed	63	50	68	55	69	57	50	43	49	47
Inappropriate/restricted	3	4	3	1	7	7	4	3	4	3
Total	524	517	514	542	591	486	467	357	408	398

* Disobeyed traffic rules does not include Alcohol/Drugs, Inexperience, Speed and Inattention

** Driver conditions do not include Inattention, Negligence, Inexperience, Fatigue, Age

Table 20: Annual trend data

Queensland 1991-2000

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Injury crashes - crash nature										
Hit object	1264	1447	1723	1877	1951	2037	2064	2013	2037	2037
Hit pedestrian	716	826	781	835	903	886	827	796	777	816
Head-on	384	379	371	392	473	452	299	321	311	260
Angle	2860	3085	3155	3521	3723	3661	3569	3530	3404	3501
Overtuned	879	877	867	884	978	869	764	742	681	809
Rear-end	1205	1490	1521	1844	1972	2119	2053	2186	2158	2487
Fall from vehicle	211	324	285	292	252	323	271	281	265	283
Sideswipe	396	431	465	505	561	567	516	583	525	519
Hit parked vehicle	234	243	247	271	293	296	259	276	287	272
Hit animal	117	123	118	104	120	120	124	87	122	85
Other	17	28	13	25	28	37	40	65	59	74
Injury crashes - traffic control										
Police	15	20	15	14	16	9	2	9	5	11
Road/Rail worked	15	12	12	18	12	26	24	24	21	13
Operating traffic lights	921	1079	1136	1348	1479	1497	1502	1521	1583	1707
Flashing amber lights	1	1	4	1	9	1	1	2	2	3
Railway-lights only	6	13	14	21	10	12	18	13	11	4
Railway-lights & boom gate	4	2	7	4	9	9	5	3	1	3
Stop sign	455	466	469	468	558	491	472	440	438	440
Give way sign	655	802	857	999	1139	1154	1058	1087	1018	1142
Railway crossing sign	4	5	7	12	7	11	5	3	3	3
Pedestrian crossing sign	123	135	100	118	117	127	95	110	96	96
Miscellaneous	12	3	4	1	0	0	0	0	1	1
No traffic control	6063	6711	6914	7541	7893	8025	7602	7669	7569	7718
Injury crashes - speed limit										
0-50 km/h	91	107	105	133	162	164	174	205	867	1140
60 km/h	5530	6190	6398	7024	7644	7686	7333	7314	6158	6290
70-90 km/h	748	822	882	1024	1016	1094	1019	1235	1414	1597
100km/h and over	1914	2134	2161	2369	2432	2423	2260	2126	2187	2114
Injury crashes after dark										
Total	2253	2568	2600	2908	3205	3228	2873	2885	2897	2970
Injury crashes - roadway feature										
Wet road	N/A	N/A	N/A	N/A	N/A	489	1554	1786	1941	1853
Crossroad	1745	1946	1985	2201	2291	2228	2067	1995	1980	2047
Roundabout	181	232	252	256	308	319	335	353	356	404
Other intersection	1836	2182	2255	2520	2784	2853	2710	2719	2497	2694
Bridge/causeway	165	161	150	166	207	200	120	170	156	161
Injury crashes - day of week										
Monday	1107	1239	1308	1433	1529	1505	1405	1501	1459	1497
Tuesday	1161	1213	1318	1420	1486	1595	1513	1450	1421	1526
Wednesday	1174	1332	1354	1449	1590	1625	1665	1638	1506	1618
Thursday	1234	1435	1425	1588	1668	1701	1654	1693	1603	1744
Friday	1435	1606	1615	1793	1897	1906	1721	1847	1878	1811
Saturday	1216	1319	1421	1681	1675	1728	1590	1445	1550	1590
Sunday	956	1109	1105	1186	1409	1307	1238	1306	1209	1357

**Table 20: Annual trend data
Queensland 1991-2000**

	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Injury crashes - location										
Brisbane City	2284	2546	2592	2973	3173	3140	2975	3017	2933	3145
Rest of BSD	1326	1520	1628	1791	1946	1770	1510	1612	1454	1612
Provincial cities	1758	1957	2018	2215	2316	2337	2225	2203	2100	2166
Rest of state	2915	3230	3308	3573	3819	4120	4077	4050	4260	4199
Injury crashes - contributing factors										
Disobeyed traffic rules	3325	3659	3865	4349	4578	4604	4315	4389	4200	4214
Alcohol/drugs	765	826	858	934	1045	1035	979	938	873	952
Inexperience	645	1288	1851	2436	2726	2823	2818	2601	2265	2420
Speed	269	441	369	438	451	436	405	448	418	495
Other driver conditions	538	880	951	869	889	1023	912	844	619	745
Age	247	448	420	456	522	580	610	668	530	540
Rain/wet road	423	874	1038	1163	1317	1146	781	1011	927	746
Negligence	160	266	187	242	209	177	214	297	385	336
Inattention	1966	2416	2290	2812	2657	2701	2850	3337	3506	3536
Road conditions	433	713	681	709	909	857	586	594	563	497
Other	608	988	897	923	1136	1400	1565	1435	1344	1457
Vehicle defects	359	435	412	460	450	425	418	421	364	313
Fatigue	157	211	192	239	219	253	253	244	218	263
No street lighting	121	94	63	77	83	69	42	63	53	53
Injury crashes - units involved										
Car	9906	10918	11407	13102	14091	14130	13564	13817	13440	13661
Utility/van	1823	2061	2252	2446	2672	2659	2450	2472	2440	2217
4-wheel drive	N/A	1088								
Rigid Truck	453	454	451	546	559	490	474	454	471	498
Articulated Truck	243	314	299	369	369	377	344	377	385	287
Road train/Bdouble	N/A	57								
Bus	128	152	116	122	150	169	177	159	177	192
Motorcycle	1160	1287	1318	1361	1347	1383	1194	1190	1113	1057
Tractor	43	51	57	73	63	77	91	94	95	92
Bicycle	900	1009	823	811	840	944	945	899	789	802
Towed device	18	10	11	17	10	5	3	9	11	8
Pedestrian	830	965	906	998	1090	1022	945	929	916	929
Animal - ridden	6	11	5	4	2	6	4	4	1	5
Animal - stock	77	79	69	65	84	79	91	64	89	44
Animal - other	44	40	54	42	39	39	38	27	34	41
Railway stock	20	22	27	30	22	25	19	18	20	4
Other	32	34	29	39	34	55	33	34	148	1174
Total	15683	17407	17824	20025	21372	21460	20372	20547	20129	22156
Injury crashes - units towing										
Total	227	249	269	329	376	470	530	554	544	550
Injury crashes - driver involvement by licence type										
Open	10546	11734	11575	12719	13472	13818	13184	13314	13056	13737
Provisional	1103	1390	2179	2913	3079	2829	2546	2660	2550	2810
Learner	246	276	323	287	321	357	375	431	427	452
Not licensed	1018	995	996	1202	1356	1377	1357	1429	1409	1363
Inappropriate/restricted	46	55	58	54	83	65	48	47	40	51
Total	12959	14450	15131	17175	18311	18446	17510	17881	17482	18413

* Disobeyed traffic rules does not include Alcohol/Drugs, Inexperience, Speed and Inattention

** Driver conditions do not include Inattention, Negligence, Inexperience, Fatigue, Age