

Hard-core Drinking Drivers In New Zealand

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Abstract

Data from studies of fatally-injured drinking drivers and convicted drinking drivers are compared using two different definitions of hard-core drinking drivers, namely those with a prior conviction for drink driving and those with a blood alcohol level exceeding 150 mg/100 mL for the current offence. The former definition leads to much greater distinctions between the two groups. The repeat offending rates for drinking and driving suggest that the harsher penalties given to hard-core offenders serve to minimize the rate of repeat offending. There have been marked changes in the age distributions of hard-core and soft-core convicted drinking drivers between 1992/1993 and 1998/1999.

Introduction

Hard-core drinking drivers have been defined as either persistent drinking drivers, often with multiple convictions for drinking and driving (1,2,3,4) or as drinking drivers with very high blood alcohol concentrations (BACs) (2,3). Bailey (5) has previously reported on three different definitions of hard-core drinking drivers involved in fatal accidents in New Zealand in the years 1991 to 1993. These were

- drivers with BACs over 150 mg/100 mL
- drivers with a prior conviction for drinking and driving
- drivers with a BAC over 150 mg/100 mL or who had a prior conviction for either drinking and driving, dangerous driving or driving while disqualified.

The current paper uses data from our In-depth Fatal Accident Database (6) for the years 1994 to 1996, and from a study of repeat offending for convicted drinking drivers, to investigate further the first two definitions of hard-core drinking drivers.

Methods

Fatal road accidents in New Zealand in the years 1994 to 1996 were studied using our In-depth Fatal Accident Database. This was created by combining data from a number of official sources, linking through name and date of birth, accident or death. Data sources used included:

- the official accident reports compiled by the Land Transport Safety Authority
- the quick response reports from the police

- blood alcohol data from post-mortem and hospital samples
- coroners' reports
- the criminal conviction histories of all the drivers involved
- the traffic conviction histories of all the drivers involved.

The traffic offending histories of every drinking driver convicted since July 1992 were supplied by the police using data from the Law Enforcement Computer. All prior convictions recorded on the Law Enforcement Computer were considered. These generally date back to the early 1970s although, sometimes, earlier conviction data had been back-captured.

Levels of THC, the active ingredient of cannabis, were obtained from a study of the role of cannabis in fatally injured drivers in the years 1995 to 1996 (unpublished research).

Data were analyzed with programs written in the programming languages Pascal and Delphi.

Hard-core drinking drivers were characterized in two ways: those who had a prior conviction for drinking and driving or those who had a blood alcohol (or the equivalent breath alcohol) level exceeding 150 mg/100 mL. Soft-core drinking drivers are the non hard-core drinking drivers.

Results

Table 1 presents the characteristics of hard-core and soft-core drinking drivers in the years 1994 to 1996, using the two different definitions of hard-core drinking drivers.

Table 1 Characteristics of hard-core and soft-core drinking drivers in fatal accidents

	Blood alcohol level		No. of prior drink driving convictions		
	81-150	>150	0	≥1	≥2
N	88	178	161	105	53
% total	33.1	66.9	60.5	39.5	19.9
% aged 15-19	10.2	10.1	15.5	1.9	0.0
% aged 20-24	37.5	25.8	34.2	22.9	17.0
% aged 25+	50.0	61.2	47.8	72.4	79.2
% female	13.6	6.2	11.8	3.8	3.8
% involved in prior injury accident	6.8	10.1	3.7	17.1	13.2
Mean BAC of >80	121	214	170	203	207
% BAC>150	0	100	59.1	79.0	77.4
% at excessive speed	53.4	59.0	58.4	55.2	62.3
% with prior criminal conviction	39.8	47.2	32.3	63.8	75.5
% with prior traffic conviction	64.8	68.5	46.0	100	100
Mean no. prior criminal convictions if any	11.9	7.5	6.0	11.1	12.8
Mean no. prior traffic convictions if any	4.1	5.2	3.4	5.9	8.6
% with detectable THC	31.8	36.0	21.6	55.3	60.9

	Blood alcohol level		No. of prior drink driving convictions		
	81-150	>150	0	≥1	≥2
% with prior conviction for:-					
Violence	22.7	19.1	13.0	31.4	37.7
Anti-social behaviour	20.5	23.0	13.0	36.2	47.2
Dishonesty	23.9	27.5	16.1	41.9	58.5
Cannabis use	22.7	21.9	13.7	35.2	45.3
Drink driving	25.0	46.6	0	100	100
Urban speeding	38.6	33.1	28.6	44.8	50.9
Rural speeding	15.9	18.5	14.9	21.9	18.9
Dangerous driving	11.4	13.5	5.6	23.8	32.1
Careless driving	18.2	19.7	9.9	33.3	39.6
Driving while disqualified	11.4	13.5	1.9	29.5	52.8

Table 2 presents data on repeat drink driving and driving while disqualified convictions for drinking drivers convicted in the 12-month period October 1995 to September 1996. Also included is information on the penalties received for the drink driving offence in this period. Data are presented for hard-core and soft-core drinking drivers according to the two different definitions, as well as for two other groups of hard-core drinking drivers.

Table 2 Repeat offending by convicted drinking drivers

Group	N	% recidivists for		Mean BAC >80	% given		Mean fine (NZ\$)
		DD*	DWD*		periodic detention	prison	
No prior DD* cvns*	12240	16.7	3.7	156	5.1	0.6	702
≥1 prior DD cvns	11006	24.8	11.7	171	32.3	9.2	885
≥2 prior DD cvns	6016	27.8	14.7	177	38.9	15.3	889
≥2 prior DD & 2 DWD cvns	2371	34.7	22.6	176	39.9	25.6	716
BAC=81-150	9088	17.6	6.3	124	14.8	3.1	674
BAC>150	11544	22.5	8.1	194	19.9	5.5	890
≥1 prior DD cvn, BAC>150	6147	26.4	12.2	198	33.1	10.0	978

* cvns = convictions

DD = drinking and driving

DWD = driving while disqualified

Table 3 compares the age distributions of hard-core and soft-core drinking drivers in two 12-month periods, July 1992 to June 1993 and July 1998 to June 1999, according to the two different definitions of hard-core drinking drivers.

Table 3 Age distributions of convicted drinking drivers in 1992/1993 and 1998/1999

Group	Year	% 15-19	% 20-24	% 25-34	% 35-44	% 45+
No prior DD	1992/1993	19.4	30.9	28.5	12.6	8.3
convictions	1998/1999	24.8	19.4	26.8	16.6	12.2
≥1 prior DD	1992/1993	5.4	24.3	40.5	19.9	9.7
convictions	1998/1999	5.4	13.8	37.4	27.7	15.4
BAC=81-150	1992/1993	16.4	31.0	31.7	12.5	8.3
	1998/1999	17.0	19.0	30.3	19.7	13.8
BAC>150	1992/1993	9.6	26.4	35.7	18.2	10.0
	1998/1999	7.7	16.6	35.2	25.3	15.1

Discussion

Much larger differences are found between hard-core and soft-core drinking drivers when the former are defined in terms of prior drink driving convictions than by blood alcohol level. The difference is even greater in terms of prior conviction histories when considering those hard-core drinking drivers with two or more prior drink driving convictions. Indeed, there is little difference in the parameters between those drivers with BACs over 150 mg/100 mL and those below this level, except for the rate of prior drink driving convictions.

To some extent, the difference in the conviction histories for recidivists versus non-recidivists is due to the greater time during which the recidivists could have offended. The prior convictions are based on all prior convictions recorded from the date the Law Enforcement Computer began collecting data in the early 1980s. Some earlier convictions were back-captured later. Alternatively, just convictions in say the last five years could be considered. This was not done since many of the drivers had drink-driving convictions dating back many more than five years.

Of particular interest are the prior conviction histories for cannabis use (i.e., in non-traffic situations) and the incidences of detectable THC in the blood of a subset of the fatally injured drivers (unpublished research). For the hard-core recidivists, poly-drug taking seems to be the problem rather than just excessive alcohol consumption. This aspect requires further research.

Many of the hard-core recidivists have a criminal history. This includes convictions for violence, anti-social behaviour other than drug taking and dishonesty, in addition to those for non-traffic cannabis use as noted earlier. The hard-core recidivists have about double the mean number of prior criminal or prior traffic convictions for those who have any. There is no particular pattern for the drivers classified by blood alcohol level. Consequently, disobeying the law regarding drinking and driving is only part of the law breaking activities of recidivistic drinking drivers.

Although the hard-core recidivists differ markedly from the soft-core drivers in terms of their characteristics in fatal accidents, there is less difference in their repeat convictions for drinking and driving in the three years following their first drink driving conviction after September 1995, as shown in Table 2. This is probably a consequence of the harsher penalties given to the hard-core offenders for the initial offence, as shown in the table. For example, virtually none of the soft-core drinking drivers received a term of imprisonment, whereas one quarter of those with two or more prior drink driving convictions did. Prison terms were more common for the hard-core recidivists than for the drivers with a high BAC.

There was a smaller difference in the rates of repeat drink driving for the hard-core drivers defined in terms of BACs than for those defined in terms of recidivism for drink driving. Other penalties, such as periodic detention and fines, also differed between the hard-core and soft-core recidivists, particularly the percentage given periodic detention.

The hard-core recidivists were also much more likely to reoffend for driving while disqualified than the soft-core drivers. This may partly account for the lower than expected rate of reoffending for drink driving by the hard-core recidivists. A driver repeat offending for driving while disqualified is likely to receive a long term of imprisonment. This term is usually appreciably longer than that given for repeat drink driving.

Trends with time for the convicted drinking drivers are shown in Table 3. Data are given by age group for just two years, July 1992 to June 1993 and July 1998 to June 1999. These show large changes in the age distributions between the two years, particularly for the age group 20 to 24. The total number of drink driving convictions in the two years is similar. The percentage of hard-core recidivists aged 20 to 24 decreased somewhat more than did the corresponding percentage of soft-core drinking drivers.

Similar data can be computed for the drinking drivers in fatal accidents. However, because of the relatively small total numbers when divided into age groups and recidivist and non-recidivist, the results are not statistically significant. There does, however, appear to be a trend that hard-core recidivists aged 20 to 24 decreased appreciably more than did the soft-core recidivists after 1994. This trend needs to be confirmed from data on injured drinking drivers, of whom there are many more than fatally injured drinking drivers.

The data in Table 3 also show a significant increase in hard-core recidivists aged over 34 between the two years. This increase is more pronounced in the age group 35 to 44 for the hard-core recidivists than for the soft-core drinking drivers. Much of the observed increase for teenage drinking drivers is associated with the large increase in this age group in the low BAC level of 30 mg/100 mL, which is applicable only to teenage drivers. It is not known whether this is due to a shift in lower blood alcohol levels by teenage drinking drivers or to greater enforcement effort by police aimed at teenage drivers. This pattern may change with the recent lowering of the legal drinking age to 18.

The data presented on hard-core drinking drivers may change shortly. On 1 March 1999 new legislation was introduced affecting drinking drivers. As a result, in the following nine months, the average term of imprisonment, for the 9.8% of recidivists who were imprisoned (up from 8.1% one year earlier), increased from 73 days to 169 days. However, other penalties changed little; for example, periodic detention was given to 31.9% of recidivistic drivers rather than to 32.3% one year earlier. It remains to be seen whether the greater prison terms for a relatively small percentage of drivers will reduce repeat offending rates, or serve as a deterrent to non-imprisoned drivers. This will be evaluated in a year's time.

The study has shown much greater differences between hard-core and soft-core drinking drivers when they are defined in terms of repeat drink driving convictions than in terms of high or low blood alcohol levels. An alternative approach would be to define hard-core drinking drivers as either having a prior conviction for drink driving or a blood alcohol level exceeding 150 mg/100 mL. This definition is similar to the third definition used previously by Bailey (5).

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