

PROGRESS IN REDUCING DRINK-DRIVING AND OTHER ALCOHOL-RELATED ROAD DEATHS IN EUROPE

December 2019



Acknowledgements

This report would not have been possible without the support of the ETSC Road Safety Performance Index (PIN) panel of contributing experts. A full list is available at www.etsc.eu/pin.

For more information

European Transport Safety Council
20 Avenue des Celtes
B-1040 Brussels
Tel: +32 2 230 4106
priscilla.lelievre@etsc.eu
www.etsc.eu/smart

This report is published as part of the SMART project, which receives financial support from The Brewers of Europe. The contents of this publication do not necessarily represent the views of the sponsor.

PROGRESS IN REDUCING DRINK-DRIVING AND OTHER ALCOHOL-RELATED ROAD DEATHS IN EUROPE

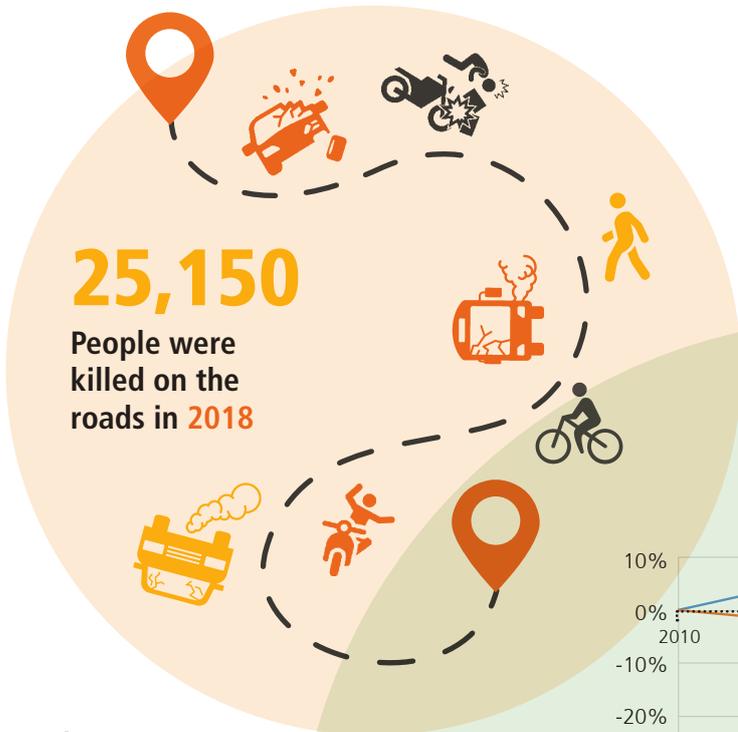
Authors

Priscilla Le Lièvre
Dovile Adminaite
Graziella Jost
Francesca Podda

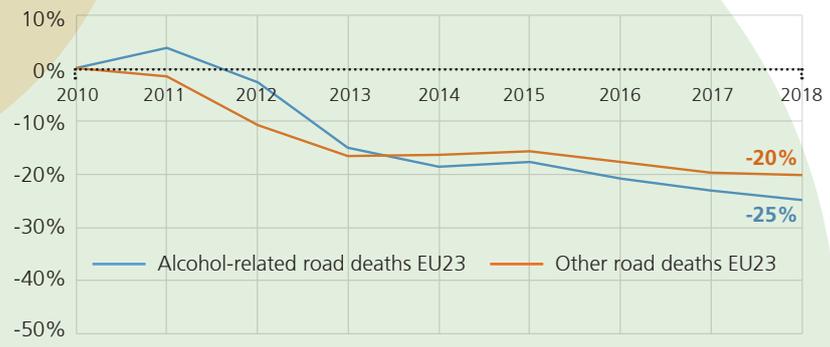
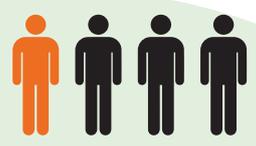
December 2019

CONTENTS

EXECUTIVE SUMMARY	7
INTRODUCTION	10
PART I. PROGRESS IN REDUCING ROAD DEATHS ATTRIBUTED TO ALCOHOL IN THE EU	12
1.1 Alcohol-related road deaths compared to other road deaths	12
1.2 Road user perceptions about drink-driving enforcement activities vary considerably between countries	17
1.3 Alcohol-related road deaths: the need to improve data collection	18
PART II. RECOMMENDATIONS AND BEST PRACTICE MEASURES TO TACKLE ALCOHOL-RELATED COLLISIONS IN THE EU	22
Recommendations to Member States	22
Recommendations to EU institutions	29
ANNEXES	
Country ISO codes	31
Table 3 (Fig.2,3) Total number of road deaths (2010-2018)	32
Table 4 (Fig.2,3) Officially-reported road deaths attributed to alcohol (2010-2018)	33
Table 5 National definitions of alcohol-related road deaths	34



25%
of all road deaths in the EU are **ALCOHOL-RELATED**



At least **5,000 DEATHS** would have been prevented in 2018 if all drivers had been **SOBER**

-25% reduction in road deaths due to alcohol between 2010 and 2018 in the EU. Other road deaths went down by 20% over the same period.



SEVERAL KEY MEASURES CAN HELP REDUCE DRINK-DRIVING IN THE EU



RECOMMENDATIONS

- ✓ Improve data collection of alcohol-related road deaths. Mandate systematic testing of all road users involved in a collision with injury.
- ✓ Consider adopting a zero tolerance level (i.e. a maximum BAC of 0.2g/l) for all road users.
- ✓ Intensify enforcement. Couple enforcement with publicity activities.
- ✓ Develop use of alcohol interlocks as part of rehabilitation programmes for first time high-level and recidivist offenders.
- ✓ Mandate the use of alcohol interlocks for professional drivers.
- ✓ Run regular campaigns.

EXECUTIVE SUMMARY

25,150 people were killed in the European Union as a consequence of road collisions in 2018.¹ Driving under the influence of alcohol is one of the four main killers on the road, alongside speeding, non-use of seatbelts and driver distraction.

Around 2,654 people were recorded killed in alcohol-related collisions in police records in 2018 in 23 EU countries, compared to 3,544 in 2010. However, these two figures are likely to be lower than the true figures due to a high level of underreporting of road deaths attributed to alcohol and data collection limitations.²

Recorded road deaths attributed to alcohol were cut by 25% between 2010 and 2018 in the EU23, while other road deaths went down by 20% over the same period.

In 15 countries, progress in reducing alcohol-related road deaths has been faster than overall reductions in other road deaths.

Estimates of the number of road deaths attributed to alcohol are not available in Italy, Malta, and the Netherlands, leaving those countries with no indicator for the effectiveness of their drink-driving policy measures.

Enforcement is essential for giving drivers the feeling that there is a significant risk of being caught and punished when drinking and driving. Understanding road user perceptions on the risk of being subjected to drink-driving enforcement is crucial to evaluating the effectiveness of police efforts.

On average, in 2018, 22.5% of European respondents thought that, on a typical journey, they would be likely to be checked for drink-driving by the police (compared to 18% in 2015). Even though driver perception on the likelihood to be tested for alcohol has increased since 2015, the scale of enforcement activities in the EU remains largely insufficient.

There is a widespread consensus that the actual number of alcohol-related road deaths in many countries is higher than the officially-reported numbers. The European Commission estimates that the actual number of alcohol-related road deaths in the EU is up to 25% of all road deaths.³ Yet based on official data reported by EU Member States, the proportion of alcohol-related deaths in the EU is around 14% of all road deaths.

There are differences in national definitions of road deaths attributed to alcohol. The European project SafetyNet recommended using the following definition: “any death occurring as a result of a road accident in which any active participant was found with a blood alcohol level above the legal limit”. Under such a definition, a cyclist killed by an impaired driver over the legal BAC limit, or a pedestrian killed by a cyclist over the legal BAC limit should be considered an alcohol-related road death. Traditionally, in many countries, only deaths of impaired drivers, or deaths of victims of impaired drivers were considered alcohol-related road deaths, or even only victims of collisions police suspected to be due to drink-driving.



¹ European Commission (2019), Road Safety 2018, How is your country doing?, <http://bit.ly/2qyOfbc>

² ETSC (2018), An Overview of Road Death Data Collection in the EU, PIN Flash report 35, <http://bit.ly/33vUIAV>

³ ECORYS, COWY (2014), Study on the prevention of drink-driving by the use of alcohol interlock devices, <https://goo.gl/hMh4To>.

Austria, Cyprus, Germany, Denmark, France, Croatia, Poland, Portugal, Switzerland and Israel can provide data according to the SafetyNet recommended definition. However, the legal blood alcohol concentration (BAC) limits are not the same in all these countries for all road users, or a category of them. For instance, a pedestrian killed by a driver with 0.3g/l will be considered a drink-driving death in Poland where the BAC is 0.2g/l for all drivers, but not in France where the legal BAC is 0.5g/l. Correction factors have to be developed to make possible meaningful comparisons that consider differences in legal BAC limits.⁴

Furthermore, there are indications that not all “active” road users involved in a road collision that resulted in death or serious injury are systematically tested for alcohol, even if the country has officially adopted the SafetyNet definition.

Nine countries have introduced a standard BAC limit of 0.2 g/l and below for all drivers: Czech Republic, Hungary, Romania, Slovakia, Estonia, Poland, Sweden, Norway, and Serbia. 17 countries with a standard BAC limit of 0.5 g/l have introduced lower limits for novice and professional drivers.

All PIN countries, except Germany, Malta and Great Britain, allow for random targeted roadside alcohol breath testing. Random targeted roadside tests means that every passing driver or rider has the same probability of being selected for a drink-driving test.

A study commissioned by the European Commission’s DG MOVE and published in 2014 concluded that alcohol interlocks can offer an effective and cost-beneficial improvement to road safety in Europe, particularly for repeat offenders and commercial vehicles.⁵

Alcohol interlock programmes give offenders who would normally lose their driving licence a possibility to continue driving, as long as they are sober. The ignition interlock device makes sure that drivers can only start the engine after having completed a breath test that has indicated that they are sober. At the same time the device can collect information that can be used to monitor drink-driving behaviour.

Studies have repeatedly shown that alcohol interlock programmes, combined with rehabilitation programmes, cut reoffending rates both during and after the driver has been required to install the device in their vehicle.

Austria, Belgium, Denmark, Finland, France and Sweden are among the countries that offer alcohol interlock offender programmes.

Norway, France and Finland have legislated the use of alcohol interlocks for some categories of professional drivers.

The effects of drink-driving publicity campaigns is hard to measure but can be increased when studies are conducted on how to address the target group, and when public campaigns are supported by other measures such as enforcement and long-term education.

⁴ Vissers L. et. al. ITF-OECD IRTAD (2018), Alcohol-related road casualties in official crash statistics, <https://goo.gl/Ur6ubV>

⁵ ECORYS (2014), Study on the prevention of drink-driving by the use of alcohol interlock devices <https://goo.gl/U8kBVU>

KEY RECOMMENDATIONS TO MEMBER STATES

- Improve data collection of alcohol-related road deaths, mandate systematic testing of all road users involved in a collision with injury.
- Consider adopting a zero tolerance level (i.e. a maximum BAC of 0.2g/l) for all road users.
- Intensify enforcement by setting annual targets for the number of police roadside alcohol checks. Couple enforcement with publicity activities.
- Develop use of alcohol interlocks as part of rehabilitation programmes for first time high-level and recidivist offenders.
- Mandate the use of alcohol interlocks for professional drivers.
- Organise regular nationwide campaigns to raise the public's understanding of how dangerous mixing alcohol and using the roads is.

KEY RECOMMENDATIONS TO EU INSTITUTIONS

- Propose a directive on drink-driving, setting a zero-tolerance level for all drivers.
- Develop best practice guidelines on drink-driving enforcement and sanctions.
- Ensure the timely adoption of the implementing legislation on alcohol interlock installation facilitation for motor vehicles.
- Mandate the use of alcohol interlocks, for recidivist offenders and professional drivers.
- Revise the EU Directive on driving licences.

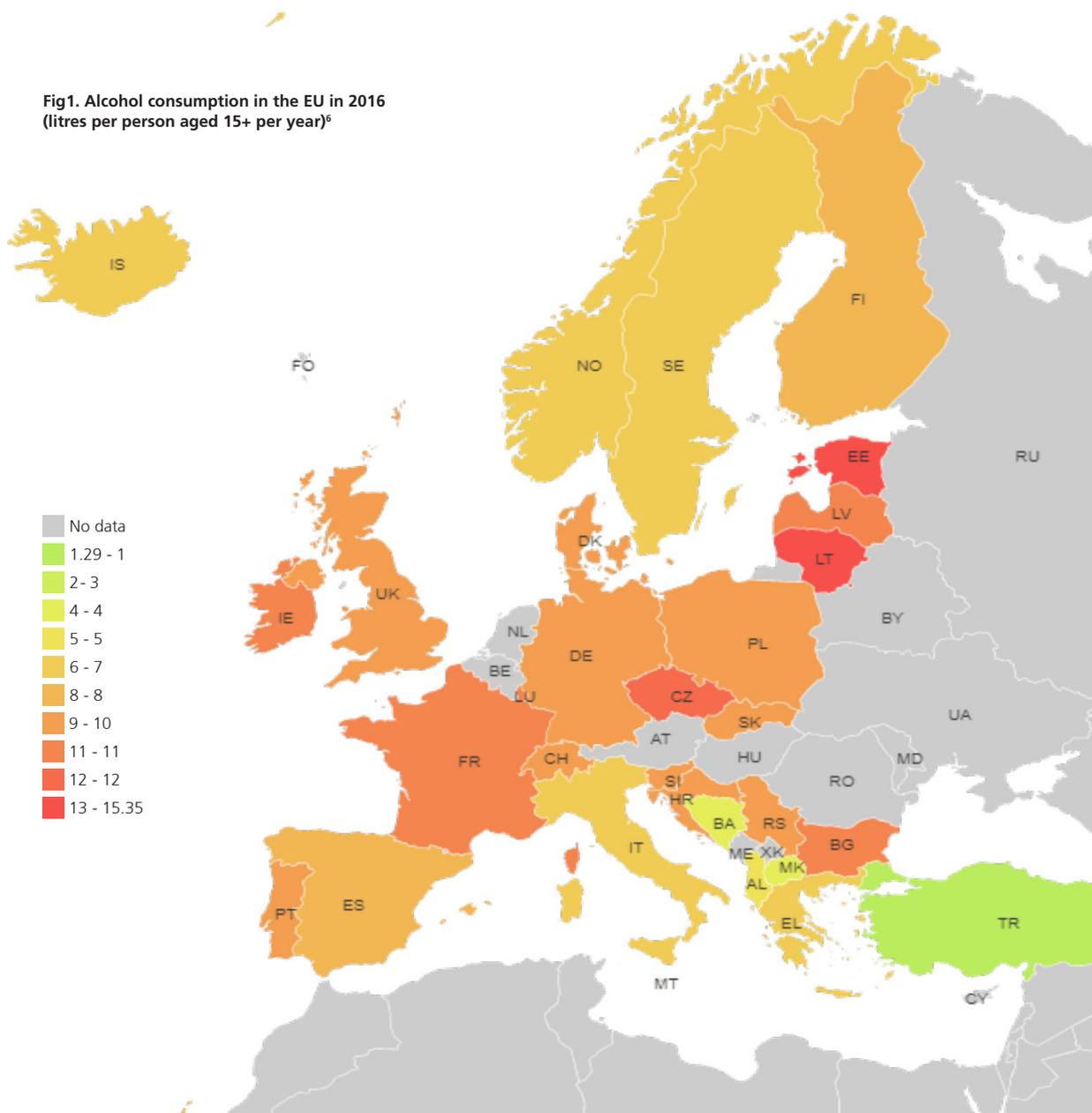


Around 25% of all road deaths in the EU are alcohol related.

INTRODUCTION

ALCOHOL CONSUMPTION AND THE PROBLEM OF ROAD DEATHS ATTRIBUTED TO ALCOHOL IN THE EU

Fig1. Alcohol consumption in the EU in 2016 (litres per person aged 15+ per year)⁶



⁶ European Commission, ECHI (European Core Health Indicators) data tool, Extracted 10.2019, <http://bit.ly/2W7njL2>

25,150 people were killed in the European Union as a consequence of road collisions in 2018.⁷ Driving under the influence of alcohol is one of the four main killers on the road, alongside speeding, non-use of seatbelts and driver distraction. Impairment through alcohol is an important factor influencing both the risk of a road collision as well as the severity of the injuries that result from collisions.

It is estimated that 1.5 - 2% of kilometres travelled in the EU are driven with an illegal Blood Alcohol Concentration, but around 25% of all road deaths in the EU are alcohol-related.⁸

According to the WHO's latest report (2019), Europe is still the region with the highest alcohol consumption. In 2016, the latest available year, 291,100 deaths were reported to be due to alcohol consumption, representing 5.5% of all deaths in Europe.⁹

The ESRA (2019) road user attitude survey revealed that on average in Europe only 2% of the people surveyed consider it acceptable or rather acceptable to drive under the influence of alcohol. However, 27% of male drivers and 13% of female drivers said they had driven after drinking alcohol in the past 30 days.¹⁰ While road users in Europe understand the risks related to drink-driving, the phenomenon remains widespread.

The risk of a road death increases exponentially with the blood alcohol content (BAC) level of the driver. Drivers with a BAC between 0.1g/l and 0.5g/l are 1 to 3 times more likely to be involved in a fatal collision than sober drivers. Drivers with a BAC between 0.5 and 0.8g/l are 20 times more likely to be involved in a fatal collision. For drivers with a BAC between 0.8 and 1.2g/l, the risk is 30 times higher than a sober driver.¹¹

Research has identified proven measures that can keep alcohol-impaired drivers off the road and save thousands of lives each year, including reduced BAC limits, drink-driving enforcement, alcohol interlocks for certain categories of drivers and drink-driving offenders, coupled with education and awareness-raising campaigns.¹²

Some driver groups have a much higher risk of crash or injury under the influence than others. Young male drivers not only have higher collision risks when they are sober, but the collision rate after consuming alcohol also increases faster than that of older, more experienced drivers.¹³ Therefore, some EU countries have introduced zero tolerance for novice drivers.

If, as estimated by the European Commission, 25% of road deaths, i.e about 6300 in 2018, occur in alcohol-related collisions, and at least 80% of these could have been prevented if all drivers had been sober, then at least 5000 deaths per year could be prevented by eliminating drink-driving.¹⁴

⁷ European Commission (2019), Road Safety 2018, How is your country doing?, <http://bit.ly/2qyOfbc>

⁸ European Commission (2018), Alcohol, Directorate General for Transport, <http://bit.ly/2p9PjBE>

⁹ WHO (2019), Status report on alcohol consumption, harm and policy responses in 30 European countries, <http://bit.ly/2Wc4TbP>

¹⁰ ESRA (2019), Driving under the influence of alcohol and drugs, <http://bit.ly/2MGBrb2>

¹¹ ECORYS (2014), Study on the prevention of drink-driving by the use of alcohol interlock devices <https://goo.gl/U8kBvU>

¹² ETSC (2012), Drink-driving: Towards Zero Tolerance, <http://etsc.eu/drink-driving-towards-zero-tolerance/> and US Centers for Disease Control and Prevention, Policy Impact – Alcohol Impaired Driving, <http://goo.gl/wNn7so> among others

¹³ Keall et al. (2004); Ministry of Transport New Zealand (2014); Peck et al. (2011)

¹⁴ As indicated by the estimate that the risk of a fatal collision when driving with a blood alcohol concentration of 0.5g/l is 5 times that when sober. Allsop R (2015) Saving lives by lowering the legal drink-drive limit, <https://bit.ly/362u0m9>

PART I

PROGRESS IN REDUCING ROAD DEATHS ATTRIBUTED TO ALCOHOL IN THE EU

1.1 Alcohol-related road deaths compared to other road deaths

Around 2,654 people were recorded killed in alcohol-related collisions in police records in 2018 in 23 EU countries, compared to 3,544 in 2010. However, these two figures are likely to be lower than the true figures due to a high level of underreporting of road deaths attributed to alcohol and data collection limitations (see 1.3).¹⁵

Recorded road deaths attributed to alcohol were cut by 25% between 2010 and 2018 in the EU23, while other road deaths went down by 20% over the same period (Fig.2).

Fig.2 Relative developments in recorded road deaths attributed to alcohol and other road deaths in 23 EU countries that could provide data taken together over the period 2010-2018
EU23 average: i.e. EU28 average excluding ES, IT, MT and NL as data on alcohol-related road deaths were not available in these countries. IE is excluded as the methodology changed in 2013

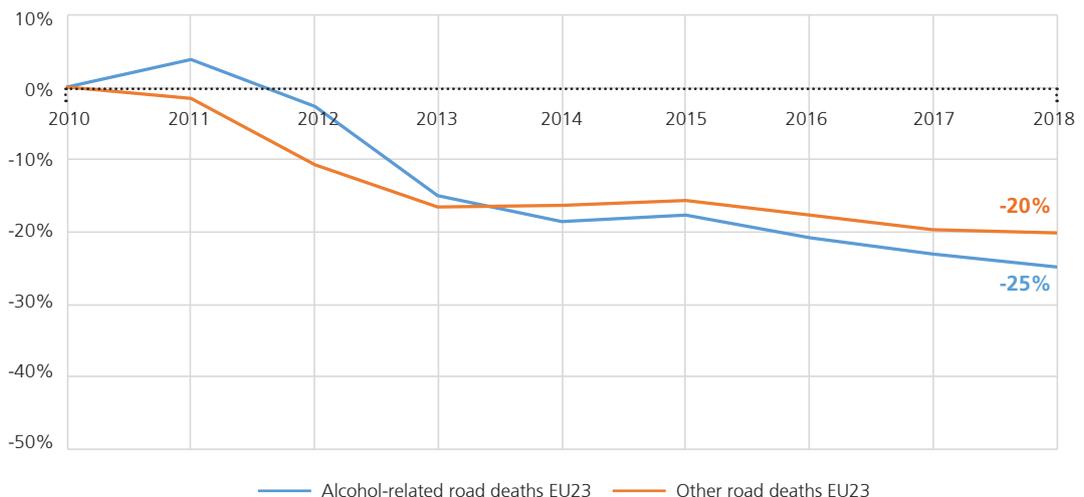


Fig.3 shows the difference between the average annual change in the number of road deaths attributed to alcohol and the corresponding reduction for other road deaths over the period 2010-2018, using each country's own method of identifying alcohol-related deaths (see indicator box).

Collectively in the EU, alcohol-related deaths have been reduced by 1.3% per year faster than other road deaths between 2010 and 2018.

In 15 countries, progress in reducing alcohol-related road deaths has been faster than overall reductions in other road deaths. In Croatia road deaths attributed to alcohol fell by 6% per year faster than other road deaths, in Latvia and Germany by 5% and in Denmark by 4%.

¹⁵ ETSC (2018), An Overview of Road Death Data Collection in the EU, PIN Flash report 35, <http://bit.ly/33vUIAV>

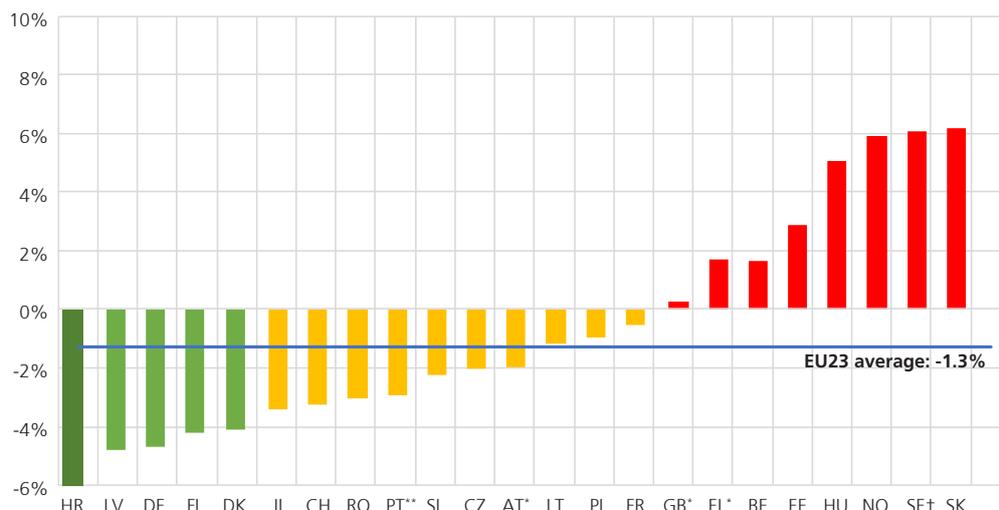
Fig.3 Difference between the average annual (%) changes in the number of road deaths attributed to alcohol and the corresponding reduction for other road deaths over the period 2010-2018

*2010-2017 **2010-2015

SE† - driver deaths only
 BG excluded from fig.3 due to insufficient data. LU and CY excluded from fig.3 as numbers of road deaths are relatively small and are subject of substantial annual fluctuations. IE is excluded as the methodology changed in 2013.

RS excluded from fig.3 as the methodology changed in 2016. But BG, LU and CY data are included in the EU23 average.

EU23 average: EU28 average excluding ES, IT, MT and NL as data on alcohol-related road deaths were not available in these countries. GB data used instead of the UK.



Slovakia and Sweden are at the other end of the ranking. Developments in road deaths attributed to alcohol in those countries have acted as a brake on overall progress in reducing road deaths. In Slovakia the number of alcohol-related road deaths increased by 1.4% over the period 2010-2018, while the number of other road deaths decreased on average by 4.8% annually, leading to the 6.2 percentage point difference seen in Fig. 3.

Estimates of the number of road deaths attributed to alcohol are not available in Italy, Malta, and the Netherlands, leaving those countries with no indicator for the effectiveness of their drink-driving policy measures. Serbia changed its methodology for collecting alcohol-related road deaths in 2016 to be in line with the EU recommended definition, so the data are not comparable over the observed times series.

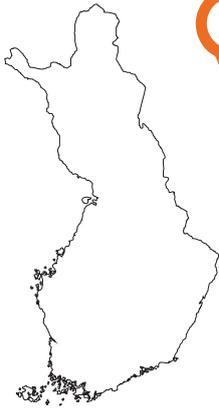


INDICATOR

Levels of road deaths attributed to alcohol cannot be compared between countries, as there are large differences in the way in which countries define and record a 'road death attributed to alcohol' (see 1.3). National definitions as provided by PIN panellists are available in the annexes.

Countries are therefore compared on the basis of developments in road deaths attributed to alcohol relative to developments in other road deaths, using each country's own method of identifying alcohol-related deaths (Fig.3). Rates of change are comparable across countries in so far as procedures for recording alcohol-related deaths and other road deaths have remained consistent in the countries concerned during the reporting period.

This ranking is an update of the previous ETSC publication: Progress in reducing drink-driving in Europe (2018). The numbers of road deaths attributed to alcohol were supplied by the PIN panellists in each country (see www.etsc.eu/pin). Estimates for this number are not available in Italy, Malta, the Netherlands and Spain. For Sweden the numbers of killed drivers who tested positive in post-mortem blood alcohol tests were used.



FINLAND

Alcohol-related road deaths decreased by 4% faster annually than other road deaths (Fig.3). In 2018, 33 people died in collisions involving a driver, a rider or a pedestrian with a BAC above 0.5 g/l (or with a strong suspicion of having been under the influence of alcohol at the time of the accident) compared to 77 in 2010. This progress can be partly explained by behavioural changes among young people in relation to alcohol. The general consumption of alcohol has decreased in Finland over the last 10 years. The number of drink-drivers caught by the police has also decreased as a consequence.¹⁶

Over the five-year period 2013 - 2017, Finnish investigation teams investigated a total of 921 fatal motor vehicle collisions. 24% (222) of the investigations found that the driver's BAC was 0.5g/l or above. Out of the 252 people who lost their lives in those collisions, 188 (75%) were the drink-drivers themselves, 54 (21%) were passengers of the vehicle driven by the drunk driver, six were occupants of other vehicle and four pedestrians.¹⁷

The investigation team reports contain a wealth of information about fatal collisions involving a driver or a rider with a BAC of 0.5g/l or above over the period 2013-2017. The main characteristics were:

- 77% were single vehicle collisions (SVCs);
- 93% of the drivers were men;
- 81% of the drivers were tested with a BAC above 1.2g/l;
- 23% of the drivers were also under the influence of another substance (illegal drugs, medicines having an impact on the ability to drive or both);
- 69% of the drink-drivers were not wearing their seat belt;
- 69% of the drivers were speeding by at least 10km/h, 45% by at least 30km/h;
- 38% of the drink-drivers were recidivists (had been caught drink-driving in the last five years), 70% had committed at least one traffic offence in the last five years (any kind of offence, including drink driving), 17% had committed five or more traffic offences in the last five years;
- Among the 176 drink-drivers, 79% were driving a passenger car, 7% a motorcycle, 4% a mopeds, 3% a van, 3% a tractor, 1% a moped. Only one driver (out of 176) was driving a truck.

Investigation reports include expert recommendations for prevention measures.

"Our investigation experts recommend treating drink-driving as a health issue. Our experts continue to see alcohol interlocks as an important prevention tool. We would like to see more participants in alcohol interlock programmes, including alcohol-dependent drivers. We would welcome as well the strengthening of the network of physicians trained in traffic medicine."
Esa Raty, Finnish Crash Data Institute (OTI)

"According to hospital data, 1/3 of injury collisions involving cyclists are alcohol-related, and early estimates indicate that even more than 1/2 of injury collisions involving e-scooters are alcohol-related. It is therefore very important to systematically test all road users involved for alcohol and collect the data."
Pasi Anteroineen, Liikenneturva, Finland

¹⁶ Liikenneturva (2019), Drink driving collisions with injuries, (in Finnish only) <http://bit.do/fiaQU>

¹⁷ In Finland, all fatal collisions are investigated in-depth. The Finnish Crash Data Institute (OTI) coordinates independent in-depth investigations of all fatal road collisions and administers the data collected from them. OTI regularly publish reports analysing 5-year data of investigated collisions involving alcohol, illegal drug or medicines. The latest report was published in 2019 (in Finnish).



CROATIA

The number of people killed in alcohol-related collisions went down from 152 in 2010 to 72 in 2018 in Croatia. This 8% annual average reduction was the result of a series of measures.

"Increased enforcement, penalties and sanctions (such as suspension or withdrawal of the driving licence from 3 months to maximum two years), have brought down the numbers of road deaths. In addition, roadside drink-driving checks combined with national campaigns showcasing the legislation and sanctions, have raised awareness among the population."
Sanja Veić, Ministry of Interior, Croatia.



DENMARK

In Denmark, the number of alcohol-related road deaths went down from 64 in 2010 to 32 in 2018.

"This 6.3% annual average reduction in the number of drink-driving deaths between 2010 and 2018 is the result of a combination of factors: sanctions, more efficient enforcement and a long-term communication strategy aimed at making drink-driving socially unacceptable. Repeated campaigns have also raised public disapproval of drink-driving".
Pernille Ehlers, Danish Road Safety Council



POLAND

From 2010 to 2018, alcohol-related road deaths in Poland decreased by 6% on average annually. Every year, the Polish police check the state of sobriety of about 17-18 million drivers. In the last ESRA survey, more than 53% of drivers surveyed in Poland thought they would be likely to be checked for drink-driving by the police.¹⁸ As a result, Poland has recorded a gradual decrease in the number of detected intoxicated drivers, as well as a decrease in the number of alcohol-related deaths, injuries and collisions.

"I think the direction of our action is the right one. Recently, however, there have been new alarming signs: alcohol consumption in the population is rising, the number of people killed in alcohol-related accidents slightly increased in 2018, and this year the police reported an increase in the number of detected drink-drivers during the summer holidays. All this indicates that the fight against alcohol in road traffic is not over in Poland and that we should consider how to improve our prevention policy."
Ilona Buttler, Motor Transport Institute (ITS), Poland

¹⁸ Achermann Stürmer, Y., Meesmann, U. & Berbatovci, H. (2019) Driving under the influence of alcohol and drugs. ESRA2 Thematic report Nr. 5. ESRA project (E-Survey of Road users' Attitudes). Bern, Switzerland: Swiss Council for Accident Prevention. <http://bit.ly/2MGBrb2>



SWEDEN

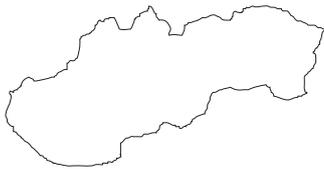
The total number of road deaths, as well as drunk car drivers killed have stagnated since 2010 in Sweden.

"The number of breath tests performed by the police has decreased dramatically since 2012. To cope with limited police resources, discussions are ongoing on the possibility of allow non-police-personnel to perform random breath tests. The police have also started a new way of organising drink-driving controls, with several short visible checks geographically widespread and lasting about 20 minutes, combined with media and Facebook communication. We also hope to see drink-driving casualties falling, when we reap the benefits of the extension of the Alco Gates system to more ports, following successful trials in Gothenburg and Stockholm. The widespread use of alcohol interlocks in buses should also help."

Anna Vadeby, National Road and Transport Research Institute, Sweden



Watch a video on the Swedish Alco Gate system, and download the case-study at: <https://etsc.eu/case-study-alco-gates-in-sweden/>



SLOVAKIA

Developments in fatal collisions attributed to alcohol have slowed down overall progress in reducing road deaths in Slovakia.

"Changing road users' attitudes is a long-term process and there is still a lot to do in Slovakia. To fight drink-driving, the police is using breath tests and the road safety department of The Ministry of Transport and Construction strongly supports projects and campaigns that raise awareness and discourage people from drinking and driving."

Roman Török, Road Safety Department, Ministry of Transport and Construction, Slovakia



SPAIN

The overall number of road deaths attributed to alcohol is unknown in Spain.

Killed drivers and cyclists are tested during the mandatory autopsy conducted by coroners, but not all of these post-mortem tests are communicated to the National Register for Road Traffic Accident Victims.

However, it is possible to report on what percentage of drivers that were tested, were shown to have had alcohol in their blood.

The results show that the likelihood of a positive alcohol test increases with injury severity. In 2018, out of those tested, 23% of killed drivers had alcohol in their blood, 12% of injured drivers hospitalised, 8% of injured drivers not hospitalised and 7% of uninjured drivers.¹⁹

There are also differences across road types. The percentage of positive alcohol tests are higher on urban roads than on the rest of the road network. Out of those tested, 14% of uninjured drivers had alcohol in their blood on urban roads (compared to 4% on other roads) while 28% of fatally injured drivers on urban roads were shown to have been drink-driving (compared to 23% on other roads).

On average, it is estimated that alcohol was a contributory factor in 21% of fatal collisions and in 12% of all injury collisions in 2018.

¹⁹ Alcohol test results are available for 70% of drivers involved in injury collisions outside urban areas, and 14% of drivers involved in injury collisions on urban roads.

1.2 Road user perceptions about drink-driving enforcement activities vary considerably between countries

The current numbers of roadside alcohol breath tests were not available for this report but the results from 2010 to 2015 were included in the ETSC report “Progress in reducing drink-driving in Europe” published in 2018.²⁰

Enforcement is essential for giving drivers the feeling that there is a significant risk of being caught and punished when drinking and driving. Understanding road user perceptions on the risk of being subjected to drink-driving enforcement is crucial to evaluating the effectiveness of police efforts.

In 2015, a consortium of research institutes surveyed road users in 17 European countries with a follow-up survey in 20 European countries in 2018. The latter ESRA (E-Survey of Road users’ Attitudes) report used the same set of questions as the 2015 study, allowing for comparison over time.²¹

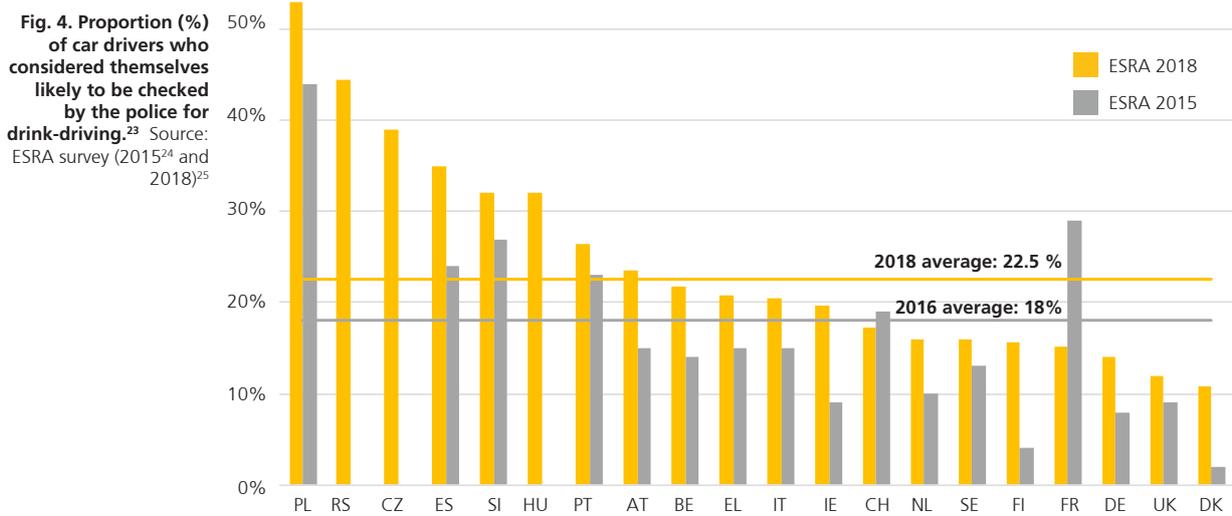
Fig.4 shows the perceived likelihood of being subject to a roadside alcohol breath test by the police. On average, in 2018, 22.5% of European respondents thought that, on a typical journey, the probability of being stopped for an alcohol test by the police was high or very high (compared to 18% in 2015). Even though driver perception on the likelihood to be tested for alcohol has increased since 2015, the scale of enforcement activities in the EU remains largely insufficient.

The European average of 22.5% also masks significant variations between countries. The perceived likelihood of a police check for drink-driving is the highest in Poland where 53% of surveyed drivers think they are likely to be checked. Poland’s increased drink-driving enforcement continues to pay off.

Poland was followed by Serbia and the Czech Republic where respectively 45% and 39% of respondents think they are likely or very likely to be tested for drink-driving on a regular trip.

The perceived likelihood of a police drink-driving check is the lowest for drivers in Denmark (11%), the UK (12%), Germany (14%), France and Finland (15%).

The perceived likelihood of the police checks for drink-driving has increased in all countries included in the survey, except for France (15% in 2018 compared to 29% in 2015) and Switzerland (17% in 2018 compared to 19% in 2015).²²



²⁰ ETSC (2018), Progress in reducing drink-driving in Europe, <http://bit.ly/2BDIL11>

²¹ Buttler, I. (2016) Enforcement and support for road safety policy measures. ESRA thematic report no. 6. ESRA project (European Survey of Road users’ safety Attitudes). Warsaw, Poland: Instytutu Transportu Samochodowego.

²² Ibid

²³ The 2018 averages have been made on the basis of the ESRA 2015 which included 16 EU countries.

²⁴ Buttler, I. (2016) Enforcement and support for road safety policy measures. ESRA thematic report no. 6. ESRA project (European Survey of Road users’ safety Attitudes). Warsaw, Poland: Instytutu Transportu Samochodowego.

²⁵ Achermann Stürmer, Y., Meesmann, U. & Berbatovci, H. (2019) Driving under the influence of alcohol and drugs. ESRA2 Thematic report Nr. 5. ESRA project (E-Survey of Road users’ Attitudes). Bern, Switzerland: Swiss Council for Accident Prevention. <http://bit.ly/2MGBrb2>

1.3 Alcohol-related road deaths: the need to improve data collection

There is a widespread consensus that the actual number of alcohol-related road deaths in many countries is higher than the officially-reported numbers. The European Commission estimates that the actual number of alcohol-related road deaths in the EU is up to 25% of all road deaths.²⁶ Yet based on official data reported by EU Member States, the proportion of alcohol-related deaths in the EU is around 14% of all road deaths.

There are differences in national definitions of road deaths attributed to alcohol. The European project SafetyNet recommended using the following definition: “any death occurring as a result of a road accident in which any active participant was found with a blood alcohol level above the legal limit”. Under such definition, a cyclist killed by an impaired driver over the legal BAC limit, or a pedestrian killed by a cyclist over the legal BAC limit should be considered an alcohol related road death. Traditionally, in many countries, only deaths of impaired drivers, or deaths of victims of impaired drivers were considered alcohol related road deaths, or even only victims of collisions police suspected to be due to drink-driving.

Austria, Cyprus, Germany, Denmark, France, Croatia, Poland, Portugal, Switzerland and Israel can provide data according to the SafetyNet recommended definition. However, the legal blood alcohol concentration (BAC) limits are not the same in all these countries for all road users, or a category of them (see Table 2). For instance, a pedestrian killed by a driver with 0.3g/l will be considered a drink-driving death in Poland where the BAC is 0.2g/l for all drivers, but not in France where the legal BAC is 0.5g/l. Correction factors have to be developed to make possible meaningful comparisons that consider differences in legal BAC limits.²⁷

Furthermore, there are indications that not all “active” road users involved in a road collision that resulted in death or serious injury are systematically tested for alcohol, even if the country has officially adopted the SafetyNet definition (table 1). Depending on the case and the country, there are several reasons why road users who participated in a fatal road traffic collision might not be tested for alcohol or where test results might not be recorded in the statistics, including:

- Testing for alcohol is not done systematically, only when the police suspects the collision was due to alcohol;
- The prosecutor decides not to test the road users for alcohol;
- Only drivers are tested for alcohol (not other active participants, such as pedestrians and cyclists either because of limited resources or because there are no BAC limits for those road users);
- Post-mortem alcohol tests or tests on unconscious road users cannot be carried out due to legal constraints;
- When tests are done by medical authorities, for various reasons, the results might not be communicated to the police.



ITALY

The scale of the alcohol-related collision problem across Italy is currently unknown. However, work is underway to fill the gap. The Carabinieri and National Police, who collect about one third of all data on road collisions with injuries, have made available some data for 2018 showing that out of 58,658 collisions with injuries, 5097 (or 8.7%) involved at least one of the drivers of the vehicles under the influence. The local police from main cities reported 2031 fines related to alcohol-related collisions, which represents 3.9% of all reported road collisions. These numbers were lower in 2017.

Italy is working to improve the collection of drink-driving deaths and serious injuries throughout the country.

²⁶ ECORYS, COWI (2014), Study on the prevention of drink-driving by the use of alcohol interlock devices, <https://goo.gl/hMh4To>.

²⁷ Vissers L. et. al. ITF-OECD IRTAD (2018), Alcohol-related road casualties in official crash statistics, <https://goo.gl/Ur6ubV>

Table 1. Alcohol tests on road collision participants.

Source: ETSC PIN Panellists.

	Is there an obligation to test all active participants (drivers, PTW riders, cyclists and pedestrians) in serious road collisions, either alive or dead (in order to provide data according to the SafetyNet definition)?	Are alcohol tests done systematically in practice for all active participants of a road collision, either alive or dead?
AT	Yes	No. Killed and unconscious road users are not tested for alcohol, unless required by the prosecutor.
BE	Yes	No. Alcohol tests are rarely done for killed and seriously injured people. Even slightly injured and unhurt people are not systematically tested for alcohol. Moreover, the police database only contains breath test results, results of blood tests are unknown in the Police database.
BG	Yes	Yes
CY	Yes, except pedestrians who are alive at the scene of the collision.	Yes, alcohol tests are done systematically in practice for drivers, PTW riders, cyclists and dead pedestrians.
CZ	Yes	No. Killed and unconscious road users are not tested for alcohol, unless required by the prosecutor
DE	No, only suspected drivers and riders.	No. Only alive suspected drivers are tested. In case of a single vehicle collision when nobody else has been injured, the alcohol test will not be done.
DK	No, only suspected active participants	n/a
EE	Yes. All active participants of a serious road collision are tested either at hospital (blood test) or at the scene (not injured participant) by a breath test. Fatally injured are tested at the autopsy	Yes
ES	No. Only drivers and cyclists are tested for alcohol.	Killed drivers and cyclists are always tested by coroners. The number of surviving persons tested depends on the specific police force. Testing all drivers and cyclists is not feasible yet, so the goal is to identify representative samples of alcohol-related collisions. The main problem lies in collisions involving hospitalised persons, who in most cases are not tested for alcohol. Alcohol test results are available for 70% of drivers involved in road collisions on roads outside urban areas and for 14% on urban roads. The sample of collisions with all drivers tested is used for estimating the proportion of alcohol-related collisions.
FI	Yes	Yes
FR	Yes	Yes
EL	No. Only drivers are tested for alcohol.	No. Police do not systematically test road users for alcohol.
HR	Yes	Road users are not tested if a doctor decides it is too dangerous because of the injuries the victim sustained in a road collision. All road collision participants whose state allows it are breath tested and if the test is positive, blood and urine shall be taken to confirm the level of alcohol. If a road user was killed, blood and urine samples are taken during autopsy. When results come out, data are included in police reports.
HU	No. In case of a fatal collision the test is not always done. Only suspected drivers are tested for alcohol.	Not always. Drivers are almost always tested for alcohol, pedestrians and cyclists only in problematic cases.
IE	Yes, except pedestrians.	Yes, except pedestrians.
IT	Yes	No. Alcohol tests are done only when alcohol is considered to be the main contributory factor in a fatal or serious collision.
LU	Yes, if there are injured or dead participants.	Yes, if there are injured or dead participants.
LV	Yes	Yes
LT	Yes	Yes
MT	No. Police do not systematically test road users for alcohol, tests are based on suspicion.	No. The cause of death is established by the health authorities following a post-mortem examination (including toxicology analysis) as part of a magisterial inquiry. However, these data are collected to establish liability rather than for statistical and analysis purposes and very often are not recorded in the police database. Statistics regarding alcohol-related road deaths are not published by the National Statistical office.
NL	Yes	No. Police do not systematically test road users for alcohol.
PL	Yes	Yes
PT	Yes	No. Police do not systematically test road users for alcohol.
RO	Yes	n/a
SE	Yes, except cyclists and pedestrians alive at the scene of a collision.	Yes. Alcohol tests are done systematically for all, except cyclists and pedestrians alive at the scene of a collision.
SI	Yes	Yes
SK	Yes	No. Alcohol tests are done only when alcohol is considered to be the main contributory factor of the fatal collision.
UK	No. If the police attend the scene, they may not ask drivers and motorcyclists to provide a sample. A driver or motorcyclist may also refuse to do so.	No. Dead road users are not tested by the police. The coroner can request alcohol data for any road death, though does not always do so.
CH	No. According to the law, they may be tested for alcohol.	No, not in all cantons. In most cantons, tests are done systematically. In some cantons, tests are done according to the severity of the collision, the suspicion of alcohol consumption, the type of road user, the time when the collision occurred, etc.
IL	No. Only suspected drivers and riders are tested for alcohol.	No.
NO	No. Tests are done for surviving participants. A killed road user will be tested upon request of the police.	No.
RS	Yes	Yes



IRELAND

Drivers involved in fatal/injury collisions must be tested, with road users killed tested during autopsy.

A police officer in Ireland must conduct a preliminary breath test where they believe a driver has consumed alcohol, or at the scene of a collision where someone has been injured and requires medical attention. Officers can also breathalyse any driver stopped at a mandatory alcohol checkpoint, without the need to form an opinion in relation to the driver of the vehicle. It is possible to take a specimen of blood from a driver taken to hospital who is incapacitated following a serious road traffic collision and to test the specimen for intoxicants. The doctor must give consent for the specimen of blood to be taken. The driver is asked, on regaining capacity, whether they consent to the issuing of a certificate of the test result on the specimen. Refusal is an offence.²⁸



THE NETHERLANDS

Majority of alcohol-related collisions not reported

There are various reasons why alcohol breath tests of road users involved in a fatal collision are not always done in the Netherlands. It is also possible that even when the alcohol test is done, the results are not always recorded in the road collision database. There were only 9 alcohol-related deaths reported in police records in 2015, but a study by SWOV estimated that the actual number was between 75 and 140 in the same year.²⁹ It is legally impossible to carry out post-mortem alcohol tests in the Netherlands (as a deceased person cannot defend themselves), unless a district attorney explicitly requires a post-mortem blood test.



SPAIN

Killed drivers and cyclists are always tested by coroners, tests conducted in hospitals are not reported to the National Register for Road Traffic Accident Victims.

According to current law, police officers must conduct an alcohol breath test as long as the driver's condition allows it, i.e. the driver is not injured, sustains minor injuries or is hospitalised but can be submitted to a breath test. Tests must be conducted and recorded in the National Register for Road Traffic Accident Victims, but, in practice, this is not always the case. When the tests are conducted at hospitals, the data are not communicated to the police due to legal constraints and, therefore, are not captured in the national register. Killed drivers and cyclists are always tested during the mandatory autopsy conducted by coroners. Most, but not all, of these post-mortem tests are communicated to the National Register.



SERBIA

Serbia is working to improve alcohol-related fatal collision data collection according to the EU guidelines on the Common Accident and Injury Database (CaDas).³⁰

Before 2016, information on whether the drivers involved in the collision were under the influence of alcohol was not collected. Traffic police officers only had to indicate whether alcohol was the 'cause' of the road collision. If the police officer estimated that alcohol was not the predominant cause, deaths following a collision involving an impaired road user would not have been counted as 'drink-driving deaths'.

²⁸ Road Safety Authority, History of drink-driving legislation, <http://bit.ly/2XuoGUT>

²⁹ SWOV, Factsheet, Driving under the influence, <https://goo.gl/5TbqrU>

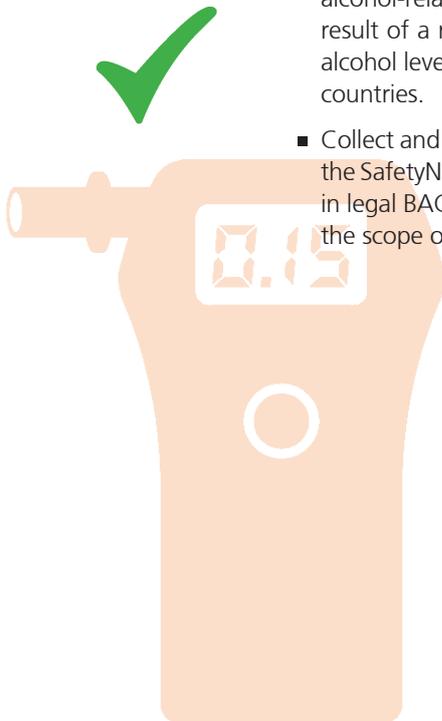
³⁰ CaDas, the Common Accident Data Set, consists of a minimum set of standardised data elements, to help comparable road accident data to be available in Europe. The CaDas can be implemented on a voluntary basis by any country that wishes to update their national road accident collection system. <https://goo.gl/Roa9M>

RECOMMENDATIONS TO MEMBER STATES ON HOW TO IMPROVE DATA COLLECTION OF ALCOHOL-RELATED ROAD DEATHS

- Aim for a systematic breath-test and subsequently blood-test for alcohol for all active road users involved in collisions resulting in road deaths or serious injuries and a systematic blood test for all such road users who are deceased. Ideally, 100% of active road users that are involved in a road collision that resulted in death or serious injury should be tested for alcohol. If a systematic alcohol testing at this level is not possible, countries should apply additional methods for adjusting the official numbers of alcohol-related road deaths and serious road injuries.
- Publish annual number of alcohol related road deaths and serious injuries according to the SafetyNet definition.
- Estimate the scope of underreporting with the aim to increase the level of reporting, while improving the communication between hospitals and police.

RECOMMENDATIONS TO EU INSTITUTIONS ON HOW TO IMPROVE DATA COLLECTION FOR ALCOHOL-RELATED ROAD DEATHS:

- Encourage Member States to adopt the SafetyNet recommended definition of an alcohol-related road death casualty as “any death or serious injury occurring as a result of a road accident in which any active participant was found with a blood alcohol level above the legal limit”, whilst recognising BAC limits differ among EU countries.
- Collect and publish the annual number of alcohol related road deaths according to the SafetyNet definition. Develop correction factors to take into account differences in legal BAC limits between Member States. Support Member States in evaluating the scope of underreporting with the aim to increase the level of reporting.



PART II

RECOMMENDATIONS AND BEST PRACTICE MEASURES TO TACKLE ALCOHOL-RELATED COLLISIONS IN THE EU

RECOMMENDATIONS TO MEMBER STATES

2.1 Consider adopting a zero tolerance level (i.e. a maximum BAC of 0.2g/l) for all road users.

Nine countries have introduced a standard BAC limit of 0.2 g/l and below for all drivers (table 2): Czech Republic, Hungary, Romania, Slovakia, Estonia, Poland, Sweden, Norway, and Serbia.

17 countries with a standard BAC limit of 0.5 g/l have introduced lower limits for novice and professional drivers.

Scotland lowered its BAC limit to 0.5g/l, in line with most of Europe, in 2014. The rest of Great Britain remains at 0.8 despite estimates for PACTS, ETSC's UK member, that a move to 0.5g/l could save 25 deaths and 95 serious injuries every year.³¹ The UK is now the last EU Member State with a general blood alcohol limit of 0.8g/l, following a decision by Malta to switch to 0.5g/l in February 2018. The new Maltese traffic regulations also set a 0.2g/l limit for drivers of commercial vehicles and for novice drivers, and a 0.0g/l limit for bus and coach drivers.³²

According to the last ESRA survey, 67% of the respondents from 20 European countries support the introduction of zero tolerance for all drivers and 78% for novice drivers.³³



Watch an ETSC video on reducing the drink-driving limit across Europe to zero: <https://etsc.eu/blood-alcohol-content-bac-drink-driving-limits-across-europe>

³¹ PACTS (2015), Saving Lives by Lowering the Legal Drink-Drive Limit, <http://bit.ly/2MHS1an>

³² Malta Traffic Regulation, <http://bit.ly/31LmE30>

³³ Achermann Stürmer, Y., Meesmann, U. & Berbatovci, H. (2019) Driving under the influence of alcohol and drugs. ESRA2 Thematic report Nr. 5. ESRA project (E-Survey of Road users' Attitudes). Bern, Switzerland: Swiss Council for Accident Prevention, <http://bit.ly/2MGBrb2>

Table 2. BAC limits (in g/l) and sanctions.
Source: ETSC and PIN Panellists

	Standard BAC	BAC Commercial drivers	BAC Novice drivers	Penalties			Random Breath Testing
				Fine	License suspended	Penalty points	
Czech Republic	0.0	0.0	0.0	Yes	Yes	Yes	Yes
Hungary	0.0	0.0	0.0	Yes	Yes	Yes	Yes
Romania	0.0	0.0	0.0	Yes	Yes	Yes	Yes
Slovakia	0.0	0.0	0.0	Yes	Yes	No	Yes
Estonia	0.2	0.2	0.2	Yes	Yes	No	Yes
Poland	0.2	0.2	0.2	Yes	Yes	Yes	Yes
Sweden	0.2	0.2	0.2	Yes	Yes	No	Yes
Norway	0.2	0.2	0.2	Yes	Yes	Yes	Yes
Serbia	0.2	0.0	0.0	Yes	Yes	Yes	Yes
Lithuania	0.4	0.0	0.0	Yes	Yes	Yes	Yes
Croatia	0.5	0.0	0.0	Yes	Yes	Yes	Yes
Germany	0.5	0.0	0.0	Yes	Yes	Yes	No
Italy	0.5	0.0	0.0	Yes	Yes	Yes	Yes
Slovenia	0.5	0.0	0.0	Yes	Yes	Yes	Yes
Austria	0.5	0.1	0.1	Yes	Yes	Yes	Yes
Israel	0.5	0.1	0.1	Yes	Yes	Yes	Yes
Switzerland	0.5	0.1	0.1	Yes	Yes	No	Yes
Belgium	0.5	0.2	0.5	Yes	Yes	No	Yes
Cyprus	0.5	0.2	0.2	Yes	Yes	Yes	Yes
Greece	0.5	0.2	0.2	Yes	Yes	Yes	Yes
Ireland	0.5	0.2	0.2	Yes	Yes	Yes	Yes
Luxembourg	0.5	0.2	0.2	Yes	Yes	Yes	Yes
Malta	0.5	0.2 (0.0 for bus and coach drivers)	0.2	Yes	Yes	Yes	Yes
Portugal	0.5	0.2	0.2	Yes	Yes	Yes	Yes
Spain	0.5	0.3	0.3	Yes	Yes	Yes	Yes
Latvia	0.5	0.5 (0.2 bus and tram drivers)	0.3	Yes	Yes	Yes	Yes
France	0.5	0.5 (0.2 bus drivers)	Yes	Yes	Yes	Yes	Yes
Netherlands	0.5	0.5	0.2	Yes	Yes	Yes	Yes
Bulgaria	0.5	0.5	0.5	Yes	Yes	Yes	Yes
Denmark	0.5	0.5	0.5	Yes	Yes	No	Yes
Finland	0.5	0.5	0.5	Yes	Yes	No	Yes
UK	0.8	0.8	0.8	Yes	Yes	Yes	No
Scotland	0.5	0.5	0.5	Yes	Yes	Yes	No

2.2 Allow for the testing of alcohol in all police roadside checks and introduce a roadside evidential breath testing procedures.³⁴

All PIN countries, except Germany, Malta and Great Britain, allow for random targeted roadside alcohol breath testing. Random targeted roadside tests means that every passing driver or rider has the same probability of being selected for a drink-driving test.

In Great Britain, breath testing may be used when there is reasonable cause for suspicion that a driver may have been drinking but police do not have powers to conduct random breath testing. Random breath testing has been suggested as a deterrent measure in the UK. Random breath testing is often accompanied by publicity that has the potential to bring the issue of drink-driving into the public eye.³⁵

Implementing a roadside evidential breath testing procedure would also allow the police to test more suspected drink-drivers with the same level of human resources.



NORWAY

The Norwegian police have begun using 'evidenzers' in roadside police checks. Until recently, the police used breathalysers in roadside police checks but in the case of a positive reading it was necessary to take the driver to a hospital for a follow-up, evidential blood test which could be used in a potential court case. But "evidenzer" breathalyser results are robust and precise enough to be used in trials without a blood sample being necessary. The use of evidential roadside testing allows the police to check more drivers than was possible under the old testing protocol.

2.3 Intensify enforcement by setting annual targets for number of police roadside alcohol checks. Couple enforcement with publicity activities.

Research has shown that increased enforcement contributes to a decrease in alcohol-related road deaths and injuries. Consistent and visible police enforcement is a powerful deterrent.³⁶

Member States should collect and monitor the annual number of alcohol breath tests and those which were positive to assess the effectiveness of their fight against alcohol on the roads.

If resources allow, combine alcohol and drug roadside police checks. Illicit drugs are usually found in combination with alcohol, with cannabis being the most common, followed by cocaine and amphetamines.³⁷ The injury risk of drugs combined with alcohol is comparable to the risk of alcohol consumption alone at a blood alcohol concentration of 1.2 g/l.³⁸

Germany's efforts against drink-riding on e-scooters around Oktoberfest

Munich police confiscated driving licenses of e-scooter riders found over the BAC limit during the week of Oktoberfest in 2019.

Altogether 414 e-scooter riders were caught riding under the influence, with 254 e-scooter riders losing their automobile driving licenses on the spot.³⁹

³⁴ ETSC (2017), Preventing Drug Driving in Europe, <http://bit.ly/2W9MpJ1>

³⁵ PACTS (2017) Fifty years of the breathalyser - where now for drink-driving? <https://goo.gl/Y6x3PA>, the report reviews a number of enforcement measures. It does not specifically recommend random breath testing for the UK.

³⁶ ESCAPE (2003), Traffic enforcement in Europe: effects, measures, needs and future, <http://bit.ly/37OjRdA>; Elvik R. (2000). Cost-Benefit Analysis of Police Enforcement, working paper 1, ESCAPE project.

³⁷ EMCDDA 2012, Driving Under the Influence of Drugs, Alcohol and Medicines in Europe: Findings from the DRUID Project, p.17

³⁸ European Commission 2012, DRUID: Driving Under the Influence of Drugs, Final Report, p.80

³⁹ Deutsche Well (2019), Timothy Jones, Oktoberfest ends with less beer drunk, but plenty of intoxicated e-scooter rides, <https://p.dw.com/p/3Qnit>

2.4 Develop use of alcohol interlocks as part of rehabilitation programmes for first time high-level and recidivist offenders.

Alcohol interlock programmes offer offenders who would normally lose their driving licence a possibility to continue driving, as long as they are sober. The ignition interlock device makes sure that drivers can only start the engine after having completed a breath test that has indicated that they are sober. At the same time the device can collect information that can be used to monitor drink-driving behaviour.

Studies have repeatedly shown that alcohol interlock programmes, combined with rehabilitation programmes, cut reoffending rates both during and after the driver has been required to install the device in their vehicle.⁴⁰

Austria, Belgium, Denmark, Finland, France and Sweden are among the countries that offer alcohol interlock offender programmes.⁴¹

Legislation needs to be well-founded in the legal system and clearly described so that it cannot be disputed on legal grounds.



BELGIUM

Offenders with a BAC over 1.8g/l and recidivists caught twice within 3 years with 1.2g/l or more are required to install an alcohol interlock in their car. The judge can also decide to impose an interlock device for offenders caught with 0.8g/l or more. This sanction is supported by a mentoring programme including awareness raising about the risks of alcohol consumption, drink-driving, recidivism and technical aspects of the device.

Currently 250 alcohol interlocks are installed and operational in vehicles in Belgium.

⁴⁰ ETSC (2016) Alcohol Interlocks and Drink-driving Rehabilitation Programmes in the EU. <https://bit.ly/2KTAf6H>

⁴¹ ETSC Alcohol Interlock Barometer, <http://bit.ly/2KxkyOu>

2.5 Mandate the use of alcohol interlocks for professional drivers.

In many EU countries alcohol interlock technology has found its way on a voluntary basis into vehicles which are used for the transport of goods or passengers.

A study commissioned by the European Commission's DG MOVE and published in 2014 concluded that alcohol interlocks can offer an effective and cost-beneficial improvement to road safety in Europe, particularly for repeat offender and commercial vehicles.⁴²

Norway, France and Finland have already legislated the use of alcohol interlock for some categories of professional drivers.



FRANCE

Buses and coaches in France are required to be fitted with alcohol interlocks. Coaches assigned to public transport for children have been equipped with alcohol interlock since 2010 and all coaches since 2015. The devices record and store data for 45 days and must be checked every year in an approved centre.



See how alcohol interlocks work.
Watch the video at:
<https://etsc.eu/alcohol-interlock-barometer/>

For more information and ETSC recommendations on alcohol interlocks see the ETSC SMART report (2016): Alcohol interlocks and drink-driving rehabilitation in the European Union. Best practice and guidelines for Member States on <http://etsc.eu/projects/smart/>

2.6 Organise regular nationwide campaigns to raise the public's understanding of how dangerous mixing alcohol and using the roads is.

Publicity campaigns using mass media are intended to change attitudes and behaviour. The effects of publicity campaigns is hard to measure but can be increased when studies are conducted on how to address the target group, and when public campaigns are supported by other measures such as enforcement and long-term education. A meta-analysis of the effect of road safety campaigns on collisions revealed that drink-driving campaigns were associated with greater accident reduction effect than campaigns on other themes.⁴³

⁴² ECORYS (2014), Study on the prevention of drink-driving by the use of alcohol interlock devices <https://goo.gl/U8kBvU>

⁴³ Phillips RO, Ulleberg P, Vaa T. (2011), Meta-analysis of the effect of road safety campaigns on accidents, <http://bit.ly/2XCtKGA>



DENMARK

Continuous national drink-driving campaigns since the 1970's have raised public disapproval of drink-driving to nearly 100% in Denmark.



"Ready for a breath test?"

80% of the people surveyed think the campaign is good or very good, more than 90% think it is relevant and almost 50% have changed their drink-driving habits.

Who was involved and how?

The Danish Road Safety Council

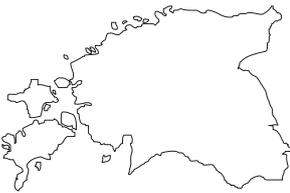
- Research, strategy, test, evaluation
- Media campaign (tv, web, radio, FB etc.)
- National press

The 98 Danish municipalities

- Participate by putting up road side posters
- Local press and events

National police and 12 police districts

- Road side checks
- Press



ESTONIA



"Yours do not let you drink and drive!"

A campaign against drink-driving was launched in January 2019 to support the measures implemented by the government such as enforcement and rehabilitation programmes for drink drivers. The campaign was shown on TV, buses, banners and also broadcast on radio. According to a survey, 66% of drivers have seen an element of the campaign. In Estonia, 99% of drivers think drink-driving and drug driving is dangerous or rather dangerous.⁴⁴

The purpose of the campaign was to make road users aware that they can prevent their loved ones from drinking and drive. The campaign is also available online: <https://youtu.be/fwOYojwmJ-E>

⁴⁴ ETSC (2018), Progress in reducing drink-driving in Europe, <http://bit.ly/2BDIL11>



GERMANY



**BUND GEGEN
ALKOHOL UND DROGEN
IM STRASSENVERKEHR**



The Association against DUI of Alcohol and Drugs, founded in 1950, has implemented a broad range of measures:

- educational activities in schools,
- campaigns, information and educational materials like leaflets, posters and videos,
- training for prosecutors and judges,
- organisation of events and
- a yearly award for outstanding road prevention activities in the field of alcohol and drug driving.

A new OECD report *New Directions in Data-Driven Transport Safety* has highlighted research carried out in the UK, which could aid targeting of measures to reduce drink-driving.⁴⁵ Ursachi et al. (2018) mined a police crash database for drink-drivers involved in collisions, and matched their home postcodes with a commercial geodemographic segmentation system called Experian Mosaic.⁴⁶ The authors were able to categorise these drivers based on lifestyle factors. The system offers insights on how to reach these groups through marketing channels: specific newspapers or magazines, websites or television channels, etc. With such results, it is possible to design targeted drink-drive compliance campaigns. Advertisement can be targeted, leading to substantial cost savings.

⁴⁵ OECD/ITF (2019), *New Directions for Data-Driven Transport Safety*, <https://www.itf-oecd.org/new-directions-data-driven-transport-safety-0>

⁴⁶ Ursachi, G. et al. (2018), "Driving while impaired by alcohol: An analysis of drink-drivers involved in UK collisions", <https://bit.ly/34380Wx>

RECOMMENDATIONS TO EU INSTITUTIONS

2.7 Propose a directive on drink-driving, setting a zero-tolerance level for all drivers.

As a first step, ETSC recommends to strengthen the existing EU Recommendation on permitted BAC 2001/115 and welcomes that this is also on the ‘to do’ list of the Commission.⁴⁷

2.8 Develop best practice guidelines on drink-driving enforcement and sanctions.

Building on the EC 2004 Recommendation on Enforcement in the field of Road Safety⁴⁸, the EU should develop best practice guidelines to encourage Member States to achieve high standards on enforcement methods and practices, and a greater convergence of road-safety-related road traffic rules.

2.9 Ensure the timely adoption of the implementing legislation on alcohol interlock installation facilitation for motor vehicles

Alcohol interlock installation facilitation is one of the life-saving measures included in the revised General Safety Regulation for motor vehicles.⁴⁹ This safety measure, defined in the new regulation as a standardised interface that facilitates the fitting of aftermarket alcohol interlock devices in motor vehicles, will be required for all new type approved vehicles as of mid-2022 and all new vehicles as of mid-2024.

ETSC calls on the EC to ensure the timely adoption of the implementing legislation on the technical requirements for alcohol interlock installation facilitation.

The new regulation includes a reference to the European standard on alcohol interlocks (EN 50436), which includes provisions on the standardised interface⁵⁰ and the installation document⁵¹, which should be used as the basis for the implementing legislation.

2.10 As a first step towards wider use of alcohol interlocks, legislate their use for repeat offenders and professional drivers.

ETSC welcomes the intention of the EC to develop new guidance to Member States on the use of alcohol interlocks announced in its new EU road safety strategy.⁵² A 2016 ETSC report would provide useful background information for this initiative.⁵³

Their new EU strategy calls upon public authorities to require the fitment of alcohol interlocks in public procurement. Although welcomed by ETSC as a way of increasing the fitment of this life saving tool, this should come about as part of binding legislation for professional drivers as opposed to a ‘voluntary commitment’.

⁴⁷ European Commission (2019) EU Road Safety Policy Framework 2021-2030- Next Steps towards “Vision Zero”. <https://bit.ly/2XXX8Xh>

⁴⁸ EC Recommendation on Enforcement in the field of Road Safety (2004), <http://bit.ly/31E7Til>

⁴⁹ Regulation (EU) 2019/XXX of the European Parliament and of the Council on type-approval requirements for motor vehicles and their trailers, and systems, components and separate technical units intended for such vehicles, as regards their general safety and the protection of vehicle occupants and vulnerable road users. Publication in the Official Journal of the European Union awaited at the time of printing.

⁵⁰ EN 50436-4: Alcohol Interlocks – Test methods and performance requirements – Part 4: Connection and digital interface between the alcohol interlock and the vehicle

⁵¹ EN 50436-7: Alcohol Interlocks – Test methods and performance requirements – Part 7: Installation document

⁵² European Commission (2019) EU Road Safety Policy Framework 2021-2030- Next Steps towards “Vision Zero”. <https://bit.ly/2XXX8Xh>

⁵³ ETSC (2016) Alcohol Interlocks and Drink-driving Rehabilitation Programmes in the EU. <https://bit.ly/2KTAf6H>

2.11 Revise the EU directive on driving licences

As part of a revision of the EU directive on driving licence, the EU should encourage Member States to make wider use of conditional licences (Codes 61 to 69 of Directive 2006/126/EC) where possible. In the context of drink-driving, Member States should be encouraged to apply the code 69 when a driver is restricted to drive only a vehicle equipped with an alcohol interlock.



The Directive on driver licencing should also be revised to allow people with an alcohol dependency to be included in alcohol interlock rehabilitation programmes, as long as it is combined with medical supervision.⁵⁴

2.12 Improve the formulation of the current driving under the influence of alcohol KPI to: "a KPI on % of drivers driving within the legal BAC limit among drivers that have been breath-tested by the police in roadside checks".

Encourage Member States to collect data on drivers driving within the legal BAC limit based on police records instead of self-reported behaviour.

- Introduce a KPI on reduction in the number of alcohol-related road deaths.⁵⁵
- Encourage Member States to collect data on alcohol-related road deaths based on the SafetyNet definition.



SPAIN

Spain has carried out prevalence studies on alcohol and drug consumption by drivers on a regular basis, since its contribution to the EU DRUID project in 2008.

Based on the DRUID methodology, the aim of these studies has been to analyse the prevalence of alcohol (exhaled air) and of drugs (oral fluid) using a representative sample of drivers (2.944 in 2018) and to analyse the evolution considering the 2008, 2013, 2015 and 2018 studies. Drivers were randomly selected by traffic authority. The latter study showed that 12% of Spanish drivers had recently taken an illegal drug and/or alcohol; 8% had recently taken drugs and 5% of the drivers showed recent alcohol intake (above 0.1 g/L). Cannabis (6%) followed by cocaine (4%) are among the most frequently consumed drugs.

⁵⁴ Skarviken P.-O. (2019), The Swedish alcohol interlock rehabilitation programme. Presentation at ETSC Safe and Sober event <http://bit.ly/33B11oh>. The evaluation study showed positive results: Forsman, A., VTI, (2019) <http://bit.ly/2P2w8Tf>.

⁵⁵ Using the SafetyNet recommended definition: any death occurring as a result of road accident in which any active participant (being a driver of a motor vehicle, a rider, a pedestrian or a cyclist) was found with blood alcohol level above the legal limit.

ANNEXES

Country	ISO Code
Austria	AT
Belgium	BE
Bulgaria	BG
Croatia	HR
Cyprus	CY
Czech Republic	CZ
Denmark	DK
Estonia	EE
Finland	FI
France	FR
Germany	DE
Greece	EL
Hungary	HU
Ireland	IE
Israel	IL
Italy	IT
Latvia	LV
Lithuania	LT
Luxembourg	LU
Malta	MT
Norway	NO
Poland	PL
Portugal	PT
Romania	RO
Serbia	RS
Slovakia	SK
Slovenia	SI
Spain	ES
Sweden	SE
Switzerland	CH
The Netherlands	NL
United Kingdom	UK

Table 3 (Fig.2,3). Total number of road deaths.

	2010	2011	2012	2013	2014	2015	2016	2017	2018
AT	552	523	531	455	430	479	432	414	409
BE	850	884	827	764	745	762	670	609	604
BG	776	656	601	601	660	708	708	682	611
CY	60	71	51	44	45	57	46	53	49
CZ	802	773	742	654	688	737	611	577	658
DE	3,651	4,009	3,601	3,340	3,368	3,459	3,206	3,177	3,275
DK	255	220	167	191	183	178	211	175	171
EE	79	101	87	81	78	67	71	48	67
ES	2,478	2,060	1,903	1,680	1,688	1,689	1,810	1,830	1,806
FI	272	292	255	258	229	270	250	223	225
FR	3,992	3,963	3,653	3,268	3,384	3,461	3,477	3,448	3,248
EL	1,258	1,141	988	879	795	793	824	731	697
HR	426	418	393	368	308	348	307	331	317
HU	740	638	605	591	626	644	607	625	633
IE	212	186	163	188	192	162	184	156	142
IT	4,114	3,860	3,753	3,401	3,381	3,428	3,283	3,378	3,334
LU	32	33	34	45	35	36	32	25	36
LV	218	179	177	179	212	188	158	136	148
LT	299	297	302	258	267	242	192	192	170
MT	15	17	9	18	10	11	22	19	18
NL ⁽¹⁾	640	661	650	570	570	620	629	613	678
PL	3,907	4,189	3,571	3,357	3,202	2,938	3,026	2,831	2,862
PT ⁽²⁾	937	891	718	637	638	593	563	602	675
RO	2,377	2,018	2,042	1,861	1,818	1,893	1,913	1,951	1,867
SE ⁽³⁾	118	100	100	101	85	106	100	89	132
SI	138	141	130	125	108	120	130	104	91
SK	353	328	352	251	295	310	275	276	229
UK	1,905	1,960	1,802	1,769	1,854	1,804	1,860	1,856	1,825
GB	1,850	1,901	1,754	1,713	1,775	1,730	1,792	1,793	1,770
CH	327	320	339	269	243	253	216	230	233
IL	352	341	263	277	279	322	335	321	278
NO	210	168	145	187	147	117	135	106	108
RS	660	731	688	650	536	599	607	579	546
EU23	23,942	23,766	21,681	20,021	19,974	20,119	19,601	19,092	18,944

Source: national statistics provided by the PIN panellists for each country.

EU23: i.e. EU28 average excluding ES, IT, MT and NL as data on alcohol-related road deaths were not available in these countries. IE excluded as data collection methodology changed in 2013, therefore prior data are not comparable.

⁽¹⁾NL -figures have been corrected for police underreporting. In the Netherlands, the reported number of deaths is checked by Statistics Netherlands (CBS) and compared individually to the death certificates and Court files of unnatural death.

⁽²⁾PT - increases in Portugal 2010 and 2011 are partly due to change in reporting methods. Like Spain prior to 2010 the number of people killed are people killed on the spot multiplied by a coefficient of 1.14. Since 2010 Portugal is able to collect deaths according to the EU common definition of any person killed immediately or dying within 30 days as a result of an injury accident. The number of people killed in 2010 would have been 845 in 2010, 785 in 2011 and 653 in 2012 using the old methodology

⁽³⁾SE - vehicle driver deaths only.

Table 4 (Fig.2,3). Officially-reported road deaths attributed to alcohol.

	2010	2011	2012	2013	2014	2015	2016	2017	2018
AT	32	51	39	31	32	28	22	33	n/a
BE	41	45	48	31	34	41	40	37	30
CY*	26	25	19	9	13	12	8	11	15
CZ	108	100	50	56	68	72	58	53	71
DE	342	400	338	314	260	256	225	231	244
DK	64	53	24	41	37	27	30	36	32
EE	10	20	15	27	18	16	8	13	13
FI	77	83	47	66	56	69	71	57	33
FR	1,230	1,220	1,130	952	958	1,057	1,009	1,035	985
EL	88	101	100	94	76	71	98	54	n/a
HR	152	151	147	96	85	115	99	92	72
HU	61	57	52	49	47	80	77	69	65
LU ⁽¹⁾	11	11	9	8	6	10	4	4	3
LV	22	26	25	10	29	18	17	12	11
LT	32	24	41	32	49	17	16	16	22
PL	455	559	584	523	470	407	383	341	370
PT ⁽²⁾	242	228	193	168	140	142	n/a	n/a	n/a
RO	194	164	224	166	181	174	160	148	118
SE ⁽³⁾	17	18	24	19	16	26	24	25	26
SI	49	35	43	38	25	37	41	32	22
SK	26	37	32	23	38	35	40	29	31
GB	240	240	230	240	240	200	230	250	n/a
CH	63	53	57	48	29	38	37	38	30
IL	14	7	8	9	5	12	10	5	8
NO	40	31	34	28	29	22	29	20	40

BG ⁽⁴⁾	25	28	28	18	13	10	6	4	6
ES	265	230	216	161	161	n/a			
IE ⁽⁵⁾	96	66	58	46	54	46	38	n/a	
IT ⁽⁶⁾	n/a								
MT	n/a								
NL	18	n/a							
RS ⁽⁷⁾	44	60	77	64	51	65	103	78	73
UK	n/a								

EU23	3,544	3,676	3,442	3,011	2,891	2,920	2,807†	2,723†	2,654†
-------------	--------------	--------------	--------------	--------------	--------------	--------------	---------------	---------------	---------------

Difference between the average annual change (%) in the number of road deaths attributed to alcohol and the corresponding reduction for other road deaths over the 2010-2018 period	
HR	-6.0%
LV	-4.8%
DE	-4.7%
FI	-4.2%
DK	-4.1%
IL	-3.4%
CH	-3.3%
RO	-3.1%
PT	-2.9%
SI	-2.2%
CZ	-2.0%
AT	-2.0%
LT	-1.2%
PL	-1.0%
FR	-0.5%
GB	0.2%
EL	1.7%
BE	1.7%
EE	2.9%
HU	5.0%
NO	5.9%
SE	6.1%
SK	6.2%

EU	-1.3%	2010-2018†
-----------	--------------	-------------------

EU23 average: i.e. EU28 average excluding ES, IT, MT and NL as data on alcohol-related road deaths were not available in these countries. IE is excluded as the methodology changed in 2013.

†An estimate as 2016, 2017 and 2018 data were not available in PT and 2018 data were not available in AT, EL and GB.

* CY and LU are excluded from the figures as numbers of road deaths are relatively small and are a subject of substantial annual fluctuations but included in the EU23 average

Source: National statistics provided by the PIN panellists for each country using each country's own method of identifying alcohol related deaths.

See Table 5 Country definition of road deaths attributed to alcohol.

⁽¹⁾ LU - 2011-2014 values refer only to the fatal road accidents and not to the number of road deaths.

⁽²⁾ PT - data from forensic postmortem test of drivers, passengers and pedestrians.

⁽³⁾ SE - vehicle driver deaths only.

⁽⁴⁾ BG - excluded from the figures due to insufficient data but included in the EU23 average

⁽⁵⁾ IE - data collection methodology changed in 2013, therefore prior data are not comparable.

⁽⁶⁾ IT - Carabinieri and the National Police, which detect about one third of all road accidents with injuries, have made available, on a trial basis for 2015, the data on driving under the influence alcohol. These data show that were 5,876 traffic accidents for which at least one of drivers of vehicles involved was under the influence of a total of 58,981. The 10.0% of incidents detected by the Police and the Traffic Police in 2015, is thus alcohol-related.

⁽⁷⁾ RS - data excluded as the methodology changed in 2016. Serbia is working to improve alcohol-related fatal collision data collection according to the EU guidelines on the Common Accident and Injury Database (CaDas)

Table 5. National definitions of alcohol-related road deaths.

SafetyNet recommended definition: Any death occurring as a result of road accident in which any active participant was found with blood alcohol level above the legal limit.

	National definition of deaths attributed to drink driving if different to the SafetyNet recommended definition
AT	SafetyNet recommended definition. However killed and unconscious road users are not tested for alcohol unless the prosecutor requires it.
BE	SafetyNet recommended definition. However, alcohol tests are not done systematically in practice (see Table 1).
BG	Deaths occurring as a result of a road traffic accident in which the blamed for the traffic accident was found with blood alcohol level above 0.5g/l
CY	SafetyNet recommended definition.
CZ	SafetyNet recommended definition.
DE	SafetyNet recommended definition. However, only alive suspected drivers are tested (see Table 1).
DK	SafetyNet recommended definition. However, only suspected active participants will be tested.
EE	Deaths occurring as a result of a road collision in which at least one motor vehicle driver was found with blood alcohol level above 0,2 g/l.
ES	Any death occurring as a result of a road collision in which an active driver or cyclist was found with a BAC above the legal limit. Pedestrians are not tested. See Table 1.
FI	Deaths in collisions involving a driver, a powered-two-wheel rider or a pedestrian with a BAC of 0.5g/l or above.
FR	SafetyNet recommended definition.
EL	Deaths in collisions where a driver was found with blood alcohol level above the legal limit. In practice, however, the Police is not systematically testing drivers for alcohol.
HR	SafetyNet recommended definition.
HU	Killed car drivers who tested positive in post-mortem blood alcohol tests. Drivers are only tested if they are assumed to be responsible for the collision.
IE	Killed road users who were tested positive for alcohol (i.e. BAC >0.2g/l)
IT	SafetyNet recommended definition. However the number of alcohol related deaths is not disseminated for two main reasons: deaths are attributed to drink driving only when alcohol is proved and considered by the Police officer as the main contributory factor of the fatal or serious collision; drivers or other killed persons on the spot might not be tested.
LU	From 2001 to 2009: killed persons of accidents where the police suspected the presence of alcohol. As from 2010: SafetyNet recommended definition.
LV	Deaths occurring as a result of road accident in which at least one driver (excluding moped riders and cyclists) was found with blood alcohol level above the legal limit (0.2 g/l for novice drivers, 0.5g/l for all other drivers)
LT	Deaths occurring as a result of a road collision in which at least one driver was found with blood alcohol level above the legal limit (0.2 g/l for novice and professional drivers, 0.4 g/l for all other drivers)
MT	Numbers of alcohol-related road deaths are not available.
NL	Since 2011, the Police no longer provides data on alcohol-related road deaths. Post-mortem alcohol tests are not allowed, unless a district attorney explicitly requires it.
PL	SafetyNet recommended definition.
PT	SafetyNet recommended definition. However in practice, the police does not systematically test road users for alcohol.
RO	Killed people tested for alcohol. Testing might only occur when the Police suspects the presence of alcohol (legal limit is 0.0 g/l).
SE	Killed car drivers who tested positive (BAC > 0.2) in post-mortem blood alcohol tests.
SI	Deaths occurring as a result of a road traffic collision in which the person recognised guilty was found with a BAC above 0.5g/l .
SK	Killed people in fatal collision where alcohol was considered by the Police officer to be one of the main contributing factor.
UK	See Table 1
GB	A reported incident on a public road in which someone is killed or injured, where at least one of the motor vehicle drivers or riders involved met one of these criteria: a) failed a roadside breath test by registering above 35 micrograms of alcohol per 100ml of breath (in England and Wales) or 22 micrograms (in Scotland). b) refused to give a breath test specimen when requested by the police (other than when incapable of doing so for medical reasons). c) died, within 12 hours of the accident, and was subsequently found to have more than 80 milligrams of alcohol per 100ml of blood (in England and Wales) or 50 milligrams (in Scotland).
CH	SafetyNet recommended definition.
IL	SafetyNet recommended definition. In practice, however, only suspected drivers and riders are tested for alcohol.
NO	Any death occurring in collisions involving a road user under the influence of alcohol or drug. Tests are done for surviving participants. Killed road users will be tested upon request only.
RS	SafetyNet recommended definition since 2016. Data collection is being progressively improved.

European Transport Safety Council

20 Avenue des Celtes
B-1040 Brussels
priscilla.lelievre@etsc.eu
Tel: +32 2 230 4106
www.etsc.eu/smart
🐦 @ETSC_EU

