NDSU UPPER GREAT PLAINS TRANSPORTATION INSTITUTE

Department Publication No. 331
August 2025

North Dakota Statewide Traffic Safety Survey, 2025:

Traffic Safety Performance Measures for State and Federal Agencies

Prepared for:

North Dakota Department of Transportation Highway Safety Division

Prepared by:

Kimberly Vachal, Program Director
Andrew Kubas, Consulting Scientist
Jaclyn Andersen, Research Support Specialist

Upper Great Plains Transportation Institute
North Dakota State University, Fargo

North Dakota Statewide Traffic Safety Survey, 2025

Traffic Safety Performance Measures for State and Federal Agencies

Prepared for

North Dakota Department of Transportation Highway Safety Division

Prepared by

Kimberly Vachal, Program Director
Andrew Kubas, Consulting Scientist
Jaclyn Andersen, Research Support Specialist

Upper Great Plains Transportation Institute
North Dakota State University, Fargo

August 2025

Acknowledgements

The authors extend appreciation to the North Dakota Department of Transportation for its support with this effort to improve insight regarding traffic safety in North Dakota. Additionally, we extend special thanks to UGPTI Research Support Specialist Jaclyn Andersen for her time and expertise in managing the data collection and enumeration activities with the project phase.

Disclaimer

This research was supported by the North Dakota Department of Transportation. The contents presented in this report are the sole responsibility of the Upper Great Plains Transportation Institute and the authors.

ABSTRACT

The statewide driver traffic safety survey provides baseline and longitudinal metrics for the Highway Safety Division and others to use in understanding perceptions and self-reported behaviors related to focus issues. A core set of questions addresses nationally agreed upon priorities, including seat belts, impaired driving, and speeding. In addition to the core issues, questions were included to better understand views on specific programs and attitudes pertinent to North Dakota drivers. Results show that more North Dakota drivers have adopted safe driving practices, but additional efforts are needed to improve safety on the state's roads.

TABLE OF CONTENTS

LIST OF FIGURES

LIST OF TABLES

1. INTRODUCTION

The United States trails other developed countries in several transportation safety metrics. One metric, road traffic death rate, is higher than in other developed countries (World Health Organization 2024). Progress has been made to reduce the number of traffic-related fatalities, but crashes resulting in death, injury, and property damage continue to occur due to preventable factors. These factors include driving under the influence of drugs or alcohol, distracted driving, speeding, and operating a vehicle without a seat belt, among others. The metric highlighted in Figure 1.1, which presents the most recent data from the World Health Organization, suggests that more work is needed to improve driver behavior and overall safety on U.S. roadways.

One critical asset in monitoring and communicating traffic safety priorities is a reliable and comprehensive means to set and measure goals (Government Accounting Office 2010). A nationwide effort to improve transparency and quantify metrics for behavior-based investments was established in 2010 to reduce motor vehicle crashes. The Governor's Highway Safety Association (GHSA) and the National Highway Traffic Safety Administration (NHTSA) designed a set of core performance measures to support traffic safety priorities and demonstrate progress related to behavioral safety plans and programs (Hedlund 2008).

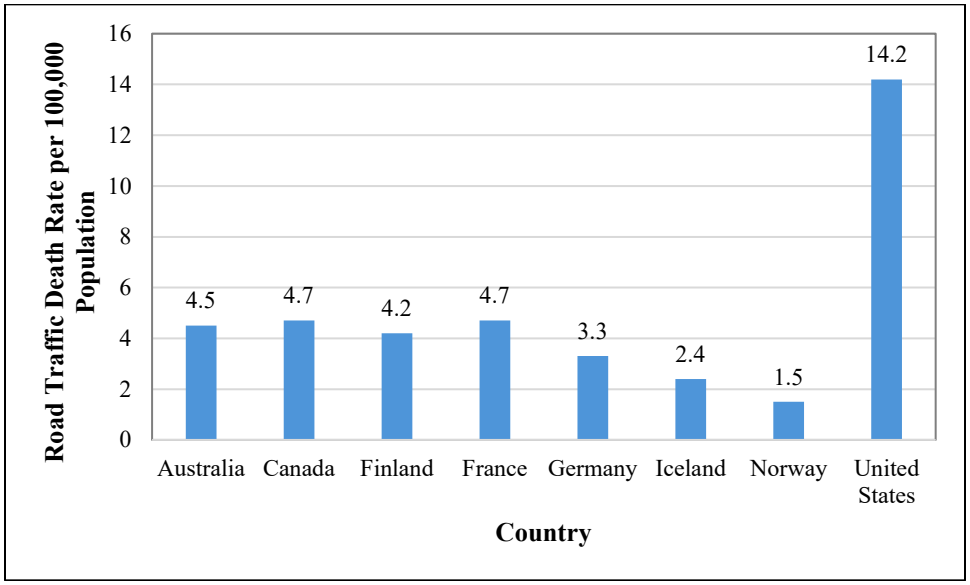

Figure 1.1 Road Traffic Death Rate of Selected Countries, 2024

Within the GHSA-NHTSA safety effort, 14 measures were agreed upon as minimum performance measures. These include 10 outcome measure-types, one behavior measure-type, and three activity measure-types. The minimum performance measures are designed to create a quantitative core for the development and implementation of highway safety plans and programs. Several uses include goal setting, goal-action linkages, resource allocation, program evaluation, and communication. Other benefits stem from improvements to organizational focus, feedback processes, and accountability (Herbel et al. 2009). The measures were defined to monitor overall traffic safety performance and progress related to the prioritized behavioral issues. These issues include occupant protection, alcohol use, and speeding.

Additionally, the measures target high-risk population groups. The 10 outcome measures focus on the following:

- Overall traffic safety performance
- Seat belt use
- Child occupants
- Alcohol-impaired driving
- Speeding and aggressive driving
- Motorcyclists
- Young drivers
- Older drivers
- Pedestrians
- Bicyclists

These 10 core outcome measures combine current exposure data, such as population and vehicle miles traveled (VMT), with existing national Fatality Analysis Reporting System (FARS) data to generate performance measures in areas common to state safety strategies and data systems. Activity measures emphasize actions such as citations or arrests under grant-funded enforcement initiatives. Seat belt observation was chosen as the single initial core behavior measure (Hedlund 2008). The measures utilized in the outcome highlights are typically calculated as follows:

- Core outcome measures
    - C-1) Number of traffic fatalities (FARS). States are encouraged to report three-year or five-year moving averages when appropriate. (One example is when annual counts are small enough that random fluctuations may inaccurately reflect true trends. This applies to all fatality measures.)
    - C-2) Number of serious injuries in traffic crashes (state crash data files).
    - C-3) Fatalities per VMT (FARS, FHWA). States should set a goal for total fatalities per VMT. States should report both urban and rural fatalities per VMT in addition to total fatalities per VMT.
    - C-4) Number of unrestrained passenger vehicle occupant fatalities. States should report these fatalities for all seat positions (FARS).
    - C-5) Number of fatalities in crashes involving a driver or motorcycle operator with a blood alcohol content (BAC) of at least 0.08 grams/deciliter (FARS).
    - C-6) Number of speeding-related fatalities (FARS).
    - C-7) Number of motorcyclist fatalities (FARS).
    - C-8) Number of motorcyclist fatalities when not wearing a helmet (FARS).
    - C-9) Number of drivers aged 20 or younger involved in fatal crashes (FARS).
    - C-10) Number of pedestrian fatalities (FARS).
- Core behavior measure
    - B-1) Observed seat belt use for passenger vehicles, front seat outboard occupants (observational survey).
- Activity measures
    - A-1) Number of seat belt citations issued during grant-funded enforcement activities (grant activity reporting).
    - A-2) Number of impaired driving arrests made during grant-funded enforcement activities (grant activity reporting).
    - A-3) Number of speeding citations issued during grant-funded enforcement activities (grant activity reporting).

The minimum performance measures publication also referenced four additional areas for measuring improvement and implementation: traffic injury outcome; driver attitudes, awareness, and behavior; traffic speed; and law enforcement activity. The following report fulfills the need for improved measurement of driver knowledge, attitudes, behaviors, and beliefs. A core question set was developed by a GHSA-NHTSA working group and presented to state departments of transportation following the preliminary recommendations in the minimum performance measures publication (Hedlund, Casanova, and Chaudhary 2009).

A set of 10 core questions was created to quantify attitudes, awareness, and self-reported behavioral patterns through periodic statewide traffic safety surveys/questionnaires. This recommended list of core questions was intended to provide a standard for states to track performance as they pursue program goals and objectives to reduce crashes, injuries, and fatalities related to high-risk driver behaviors. Core questions remain consistent across all entities. Beyond the core questions, an option to supplement the survey with other additional questions provides latitude to address local interests and to obtain other useful information related to topics such as demographics and driving activity.

Commonly, federal initiatives relating to driving behavior focus on impaired driving, seat belt use, and speeding. Thus, the core questions emphasize these issues (Hedlund, Casanova, and Chaudhary 2009). The core questions of the focus areas are as follows:

- Impaired driving
    - ID-1: In the past 60 days, how many times have you driven a motor vehicle within two hours after drinking alcoholic beverages?
    - ID-2: In the past 30 days, have you read, seen or heard anything about alcohol impaired driving (or drunk driving) enforcement by police?
    - ID-3: What do you think the chances are of someone getting arrested if they drive after drinking?
- Seat belts
    - SB-1: How often do you use seat belts when you drive or ride in a car, van, sport utility vehicle, or pickup?
    - SB-2: In the past 60 days, have you read, seen, or heard anything about seat belt law enforcement by police?
    - SB-3: What do you think the chances are of getting a ticket if you don't wear your seat belt?
- Speeding
    - SP-1a: On a local road with a speed limit of 30 miles per hour, how often do you drive faster than 35 miles per hour?
    - SP-1b: On a road with a speed limit of 65 miles per hour, how often do you drive faster than 70 miles per hour?
    - SP-2: In the past 30 days, have you read, seen or heard anything about speed enforcement by police?
    - SP-3: What do you think the chances are of getting a ticket if you drive over the speed limit?

Seven variations of these questions have been incorporated into the 2025 North Dakota Driver Survey developed in conjunction with the North Dakota Department of Transportation's Highway Safety Division (see Appendix A for the complete survey). The Highway Safety Division expanded the survey to gain additional information relevant to its goals and responsibilities. Ultimately, the core questions were slightly modified to better fit driving conditions in North Dakota. The core questions, which were included, read as follows:

- Impaired driving
    - ID-1a) In the past 60 days, how many times have you driven a motor vehicle within two hours after drinking 1–2 alcoholic drinks?
    - ID-1b) In the past 60 days, how many times have you driven a motor vehicle within two hours after drinking 3 or more alcoholic drinks?
    - ID-2) What are the chances of someone getting arrested if they drive under the influence of alcohol or drugs?
- Seat belts
    - SB-1) How often do you use a seat belt when you drive or ride in a motor vehicle?
    - SB-2) What do you think the chance is of getting a ticket if you do not wear your seat belt?
- Speeding
    - SP-1) On a road with a speed limit of 75 mph, how often do you drive faster than 80 mph?
    - SP-2) What do you think the chance is of getting a ticket if you drive over the speed limit?

The 2024 North Dakota *Vision Zero Plan* provides insight into current priorities and activities (NDDOT 2024). The current plan outlines goals related to NDDOT's overall traffic safety mission as well as specific issues to address in the next five years. The following traffic safety issues are prioritized as emphasis areas:

- Impaired driving
- Occupant protection
- Young driver
- Older driver
- Distracted driving
- Intersections
- Lane departures
- Local system roadways
- Speed management
- Commercial/heavy vehicle involved
- Emergency response and medical services and TRCC

Metrics are included to indicate progress of the overall safety mission in light of traffic fatalities and serious injuries. The single core behavior measure shows 2024 observed seat belt use at 79.8% (Vision Zero 2024). Results presented here will enhance the understanding of behavior by providing additional coverage, expanded insights into issues, and an increased number of measures.

2. METHOD

A mail survey was selected as the method for the driver traffic safety survey. A questionnaire was created by blending the core questions with other NDDOT-designated questions pertaining to education, policy, and enforcement. The questions were developed based on a literature review – which included previous surveys of this type – and guidance offered by the GHSA-NHTSA working group. The mailings to drivers included a Highway Safety Division cover letter, which invited participation and explained the purpose of the survey. The questionnaire was originally mailed to North Dakota drivers on March 1, 2025, with responses to be returned by April 1, 2025. However, an error was observed: all surveys made it to the intended addresses, but were sent to the incorrect recipients. Therefore, a second mailing took place March 7, 2025, with responses open until April 7, 2025. With this second iteration, a QR code was included in the survey to assist respondents. In the second mailing, the cover letter was updated to explain the error and instruct respondents to only complete the new survey if they had not completed the first. The electronic submission window followed the same March 7, 2025, to April 7, 2025 timeframe.

NDDOT adult driver records formed the population used for sampling. The original NDDOT mail list consisted of 11,520 addresses. Unlike prior iterations of this survey, zero drivers lived outside of North Dakota. Thus, none were removed from mailing. The sample had regional, geographic, age, and gender distributions that were a reasonable representation of the general North Dakota driver population. Ultimately, 1,672 surveys were completed and returned to the research team: 746 responses were obtained from the first mailing, 878 were returned from the second mailing, and 48 responses took place via the QR code. However, not every survey was from a self-reported North Dakota county. A total of 28 respondents did not provide an answer to the "In which North Dakota county do you live?" question and were removed from the sample. One respondent wrote "Unknown" for this question and was subsequently removed from analysis. None of the other responses were from individuals living in counties outside of North Dakota. Thus, of the usable survey responses provided, 1,643 were confirmed as valid and form the driver response sample used in the analysis.

The sample size was based on a 95% confidence interval with a 5% confidence level. Although mail survey response is usually low, with 10% typical, a slightly better response rate was expected due to the parameters used in the survey design and administration. These parameters included keeping the survey to a single page, including the state agency cover letter and mail envelopes, and providing postage-paid return envelopes.

A disproportionate stratified random sample was used to select drivers. North Dakota drivers were stratified by region (east/west) and geography (urban/rural). County jurisdictional boundaries were used to define both region and geography (Figure 2.1). Additionally, oversampling was necessary for two target driver groups: 18–34-year-old male and female drivers. The disproportionate stratified sampling structure was used to elicit sufficient driver participation to allow robust analysis of responses by region, geography, and the target driver groups. However, using these simple average responses would provide skewed results in representing the statewide driver population. For example, drivers aged 35 to 44 were 7.4% of the survey sample and account for 7.9% of the survey responses. However, this age cohort actually accounts for 18.9% of the licensed driver population in the state (FHWA 2025). Therefore, a post-stratification weighting process is used to give an appropriate weight to responses for statewide estimates. Results from post-stratification consider the age, gender, and location of North Dakota registered drivers when weighting to reflect the knowledge, attitudes, behaviors, and beliefs of the statewide driving population. Note that answers with fewer than 30 responses are not considered large enough to extrapolate to fit the entire North Dakota driver population. These instances are indicated with asterisks throughout the analysis.

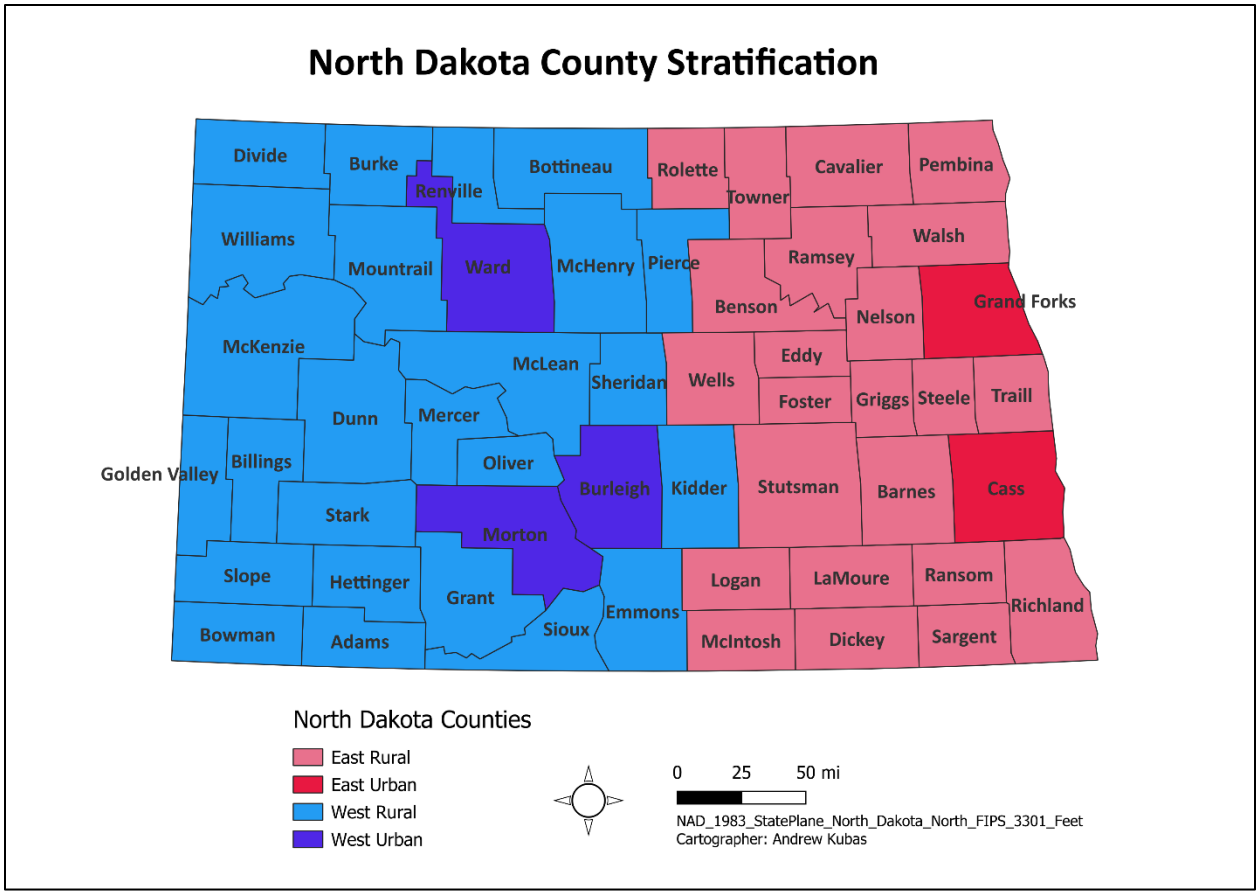

Figure 2.1 County Stratification

The regional definition was created by aggregating North Dakota health regions into two areas closely representing an east/west division of the state. The geography definition includes an urban/rural dichotomy. Urban drivers are those from counties with the largest urban population according to the most recently published data estimates from the U.S. Census Bureau. Two urban counties are located in the east and three are located in the west based on the population density geographic definitions used in the study (U.S. Census Bureau 2020). These counties represent the clear majority of the state's urban population. A change to note in the geography is that the U.S. Census reclassified Ward County to an urban area in the west. The sampling probabilities for the survey are displayed in Table 2.1.

Table 2.1 Sampling Probabilities

Region	Geography[1]	Driver Age	Sampling Probability[2]
East	Urban	18–34	0.024
East	Urban	35+	0.007
East	Rural	18–34	0.069
East	Rural	35+	0.010
West	Urban	18–34	0.041
West	Urban	35+	0.008
West	Rural	18–34	0.058
West	Rural	35+	0.010

[1]Source: U.S. Census Bureau 2020
[2]Source: U.S. Census Bureau 2023

3. RESPONSE

The survey response rate was 14.2% with 1,634 valid responses obtained from a mailing to 11,520 drivers. This was higher than the 9.9% rate during the 2024 mailing (Vachal, Kubas, and Andersen 2024) and was the highest rate since administering the survey in 2020. Response rates have generally declined by a few percentage points each year; this trend mirrors findings from other studies which identified declining response rates to mail surveys over time (Stedman et al. 2019). As expected, oversampling of the 18–34-year-old male and female driver target groups was needed to achieve a sample sufficient for statistical analysis. The target group response rate was 4.7% compared with 35.8% for other drivers. Sampling to elicit response by region and geography was successful (Table 3.1). Responses include an acceptable level of participation with comparable response rates from east, west, urban, and rural demographics.

Table 3.1 Survey Response by Region and Geography

		GEOGRAPHY		
		Urban	Rural	**Total**
REGION	East	408 (24.8%)	450 (27.4%)	**858 (52.2%)**
	West	446 (27.1%)	339 (20.6%)	**785 (47.8%)**
	Total	**854 (52.0%)**	**789 (48.0%)**	**1,643**

The sample design did not account for age or gender beyond the target male and female groups. Responses are skewed by age: those between the ages of 18 and 44 are underrepresented and those over 65 are overrepresented compared with the actual proportion of the driver population in the state (Table 3.2). The highest share of responses is among drivers aged 65 to 74. This age cohort makes up 23.5% of the survey responses. The 18–24-year-old age cohort makes up the lowest proportion of survey responses. Nonetheless, there were well over 30 responses from each age group, making statistical extrapolation possible and allowing for inferences to be drawn regarding the entire North Dakota driver population.

Response rates were slightly skewed by sex: 54.3% of respondents were female. This deviates from the North Dakota driver population in which there is an approximately equal distribution of males and females. The number of respondents for both males and females provides sufficient data to expand the responses to represent the entire statewide driver population for these two groups. The comparison to the state population supports the post-weighting for improved driver population representation with the sample.

Table 3.2 Response by Age Group

	Survey		Driver Population	
Age Group[1]	Responses	Share	Drivers[2]	Share[3]
18–24	105	6.4%	64,212	11.4%
25–34	274	16.8%	122,519	21.7%
35–44	129	7.9%	106,788	18.9%
45–54	197	12.1%	74,259	13.2%
55–64	304	18.6%	77,388	13.7%
65–74	384	23.5%	71,105	12.6%
75 and Older	241	14.7%	48,007	8.5%

[1]Frequency missing: 9
[2]Source: FHWA 2025
[3]Represents share of drivers above age 18; percentages do not account for novice (under 18) drivers

4. RESULTS

Responses to the survey questions provide valuable insight into driver perceptions, attitudes, and behaviors regarding traffic safety. Simple frequency analysis of ordinal and dichotomous survey responses provides a general characterization of driver views and behaviors. The strong response rate resulted in increased confidence. The 95% confidence interval is coupled with smaller margins of error at +/-1% when discussing statewide results, and a +/-2% error margin when addressing the population in regional, geographic, or target driver strata.

4.1 All Drivers

The core questions emphasize three specific issues: impaired driving, seat belt use, and speeding. Response frequencies for these questions are included in several forthcoming figures. These figures include 2010–2025 responses to establish metrics that may be used to identify driving trends in North Dakota.

Overall, responses show drivers believe law enforcement is most likely to ticket for impaired driving violations compared with speeding or seat belt violations. Frequencies indicate that 68.3% of drivers think the chances are higher than average that impaired drivers will be arrested (Figure 4.1). This is higher than the 49.5% and 37.1% of respondents who believe there is a greater-than-average likelihood that drivers will be ticketed either for speeding or seat belt violations, respectively.

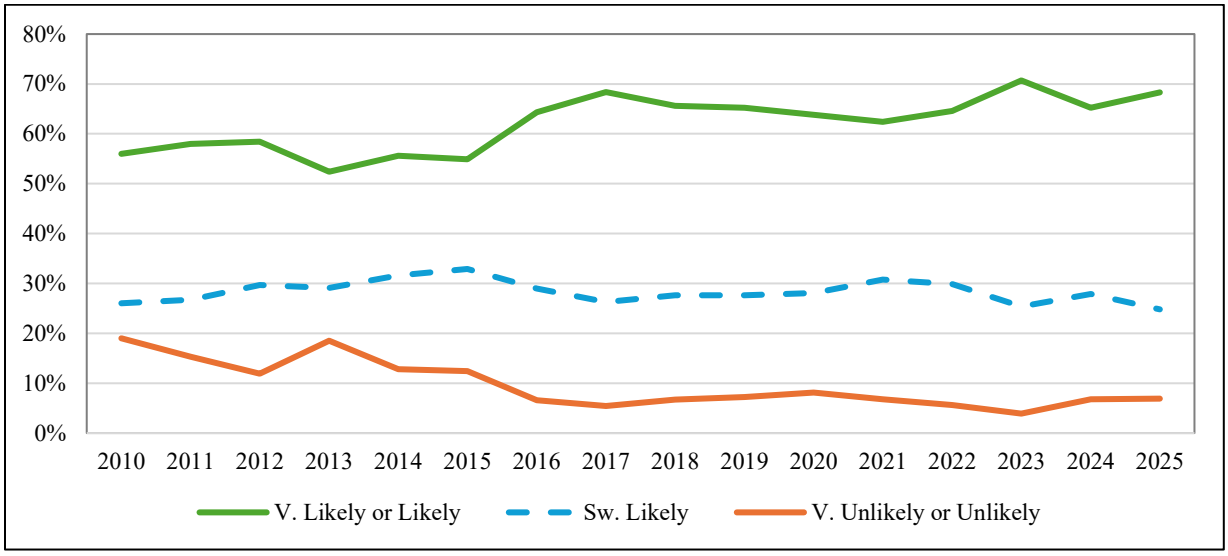

Figure 4.1 Perceived Impaired Driving Arrest Likelihood

Responses reveal that perceptions of getting a ticket for illegal driving behavior is related to whether one has driven within two hours of consuming alcohol in the last 60 days. For example, compared with drivers who never drove within two hours of consuming alcohol, those operating a vehicle at least once within two hours of consuming one or two alcoholic beverages were less likely to think that they would be ticketed for not wearing a seat belt ($F=22.190$, $df=1$, $p<0.001$) and were also less likely to believe that they would be ticketed for speeding ($F=22.442$, $df=1$, $p<0.001$). The same pattern occurred among those who operated a vehicle within two hours of consuming three or more alcoholic drinks. In this survey, operating a vehicle after consuming three or more alcoholic beverages is also associated with a lower perceived chance of getting a ticket for not wearing a seat belt ($F=14.274$, $df=1$, $p<0.001$) and speeding ($F=15.518$, $df=1$, $p<0.001$). This suggests that a driver engaging in one dangerous activity (driving after

consuming alcohol) may also take part in another – driving unbelted and/or speeding – and therefore may exponentially increase danger on the roadway.

Responses from this questionnaire show 34.0% of respondents reported that they had driven a vehicle within two hours of drinking one or two drinks at least once during the past two months (Figure 4.2). This is an improving trend compared with the 2024 iteration of the survey in which 40.0% of respondents reported this behavior. Only 4.9% of respondents noted that they had operated a vehicle within two hours of drinking three or more drinks at least once during the previous two months (Figure 4.3). This once again represented improving behavior compared with 2024: last year, 6.1% of respondents admitted to driving after consuming this many alcoholic beverages. Patterns from 2013–2025 are generally consistent, but the 2023–2025 three-year interval marks a decline in self-reported instances of driving after consuming alcoholic beverages. It would be prudent to continue monitoring these self-reported behaviors in the future and further investigate what caused the decline starting in 2023.

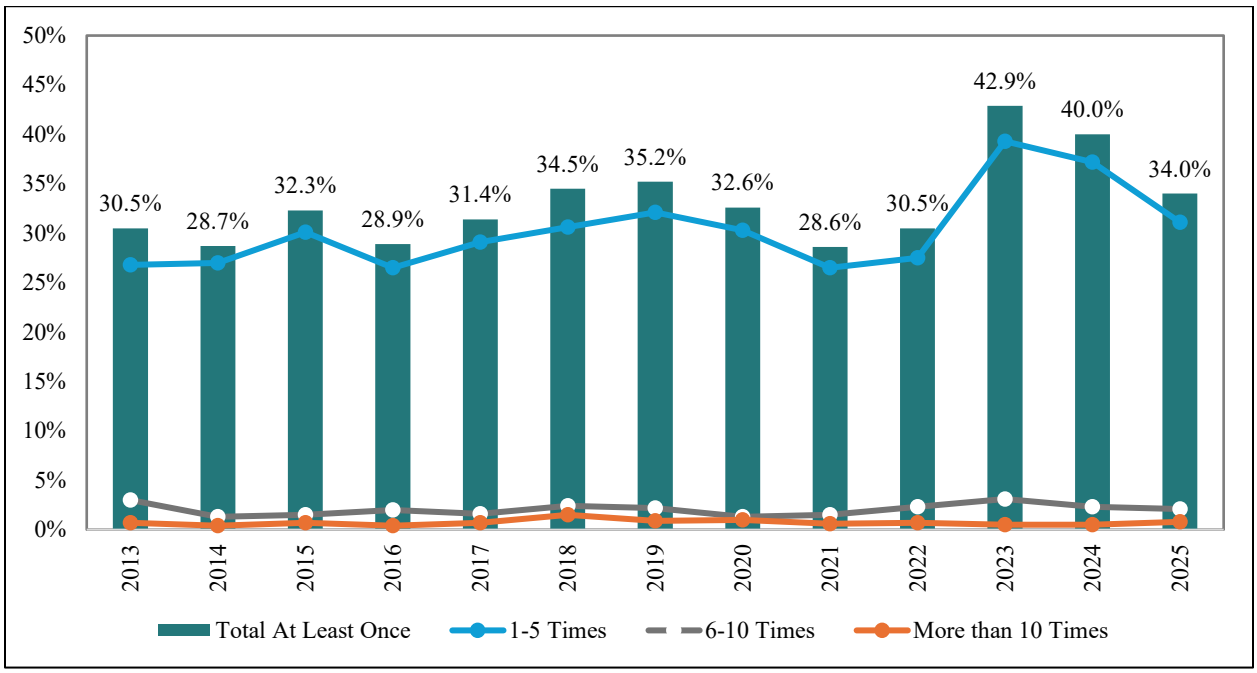

Figure 4.2 Self-Reported Driving-After-Drinking Activity within Two Hours of Consuming 1–2 Drinks

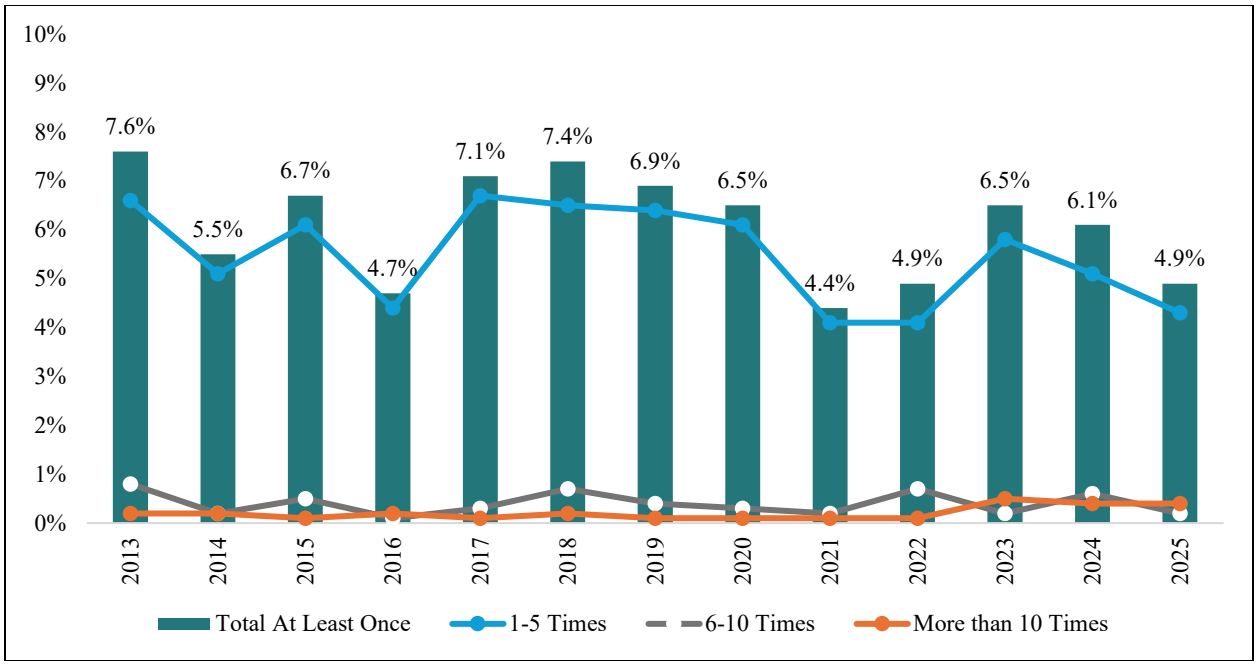

Figure 4.3 Self-Reported Driving-After-Drinking Activity within Two Hours of Consuming 3+ Drinks

In each of the 16 years the question has been asked, most respondents indicated that the chances of being arrested for impaired driving is more likely than not based on those who answered "likely" or "very likely" to the prompt (Figure 4.4). Note that the share of respondents believing the chance of arrest is either "unlikely" or "very unlikely" has remained relatively stable since 2016.

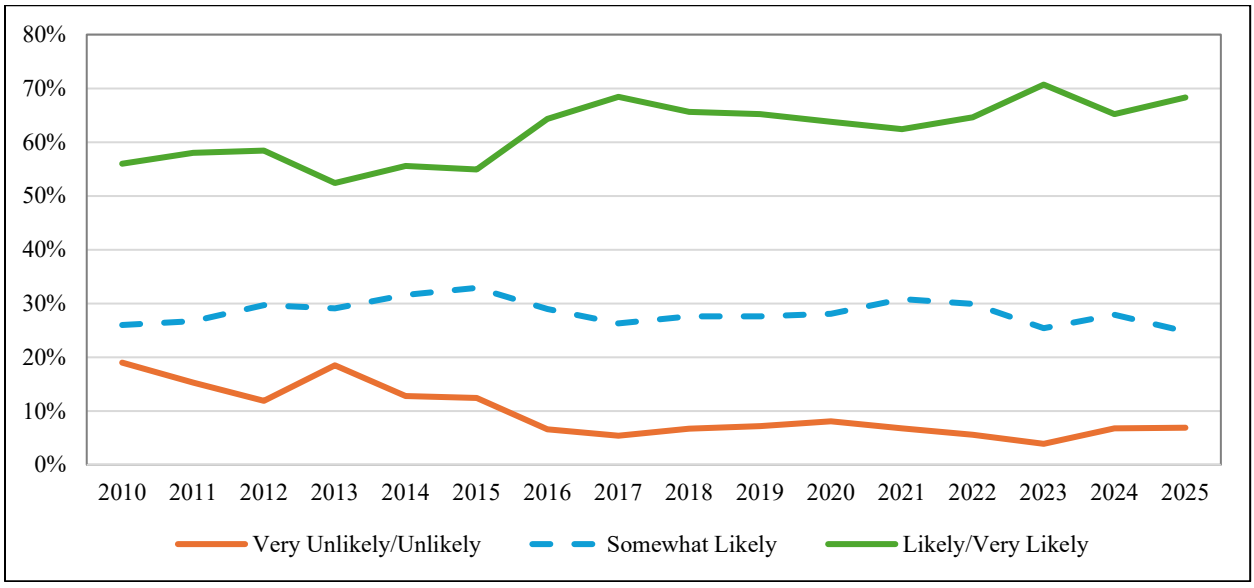

Figure 4.4 Chances of Being Arrested if Driving Impaired

The share of drivers reporting that they always use their seat belts when driving or riding in a vehicle is slightly higher than the information presented by the core behavior metric of 79.8%. Driver self-reported use collected here shows 81.8% with another 13.8% reporting usage as nearly always (Figure 4.5). The 81.8% of drivers always wearing a seat belt represents a decrease from 85.8% in 2024. Only 1.1% of drivers report that they rarely or never use a seat belt, which is a slight decrease from the 1.4% who

reported such use last year. Overall, these metrics indicate that drivers in North Dakota are generally safe with regard to seat belt use.

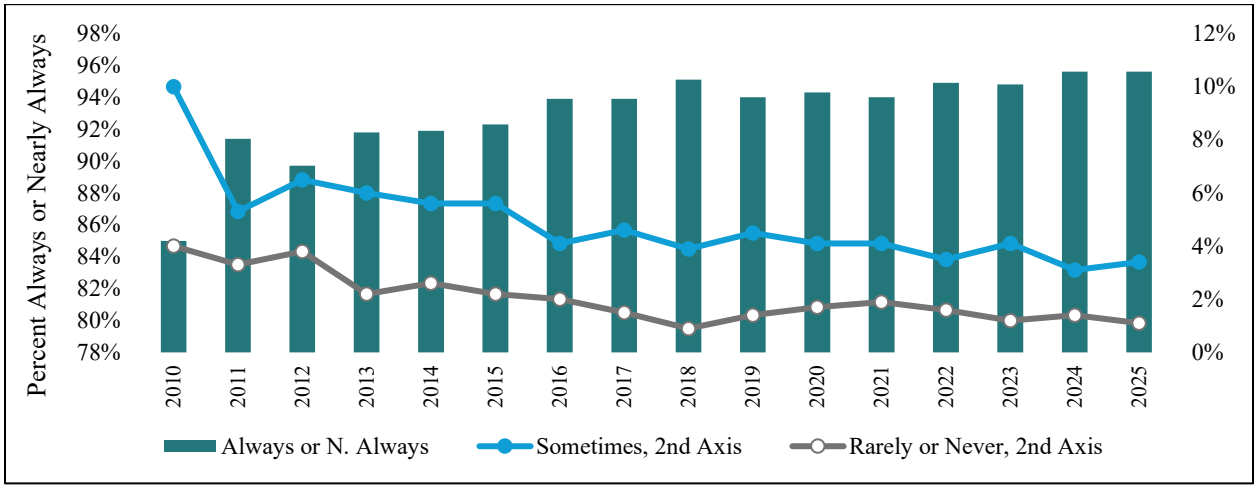

Figure 4.5 Self-Reported Seat Belt Use

Perceptions of receiving a ticket for not wearing a seat belt is evenly distributed (Figure 4.6). As of 2025, roughly one-third (37.1%) of respondents think a ticket is either "very likely" or "likely," roughly one-third (37.1%) think a ticket is "somewhat likely," and over one-quarter (25.7%) reported ticket likelihood as either "unlikely" or "very unlikely." The incremental increase in seat belt use may be associated with the incremental decrease in perceived likelihood of receiving a ticket for not using a seat belt. Put simply, a greater tendency to wear a seat belt may be the reason why perceptions for receiving a ticket for not wearing one have diminished in recent years.

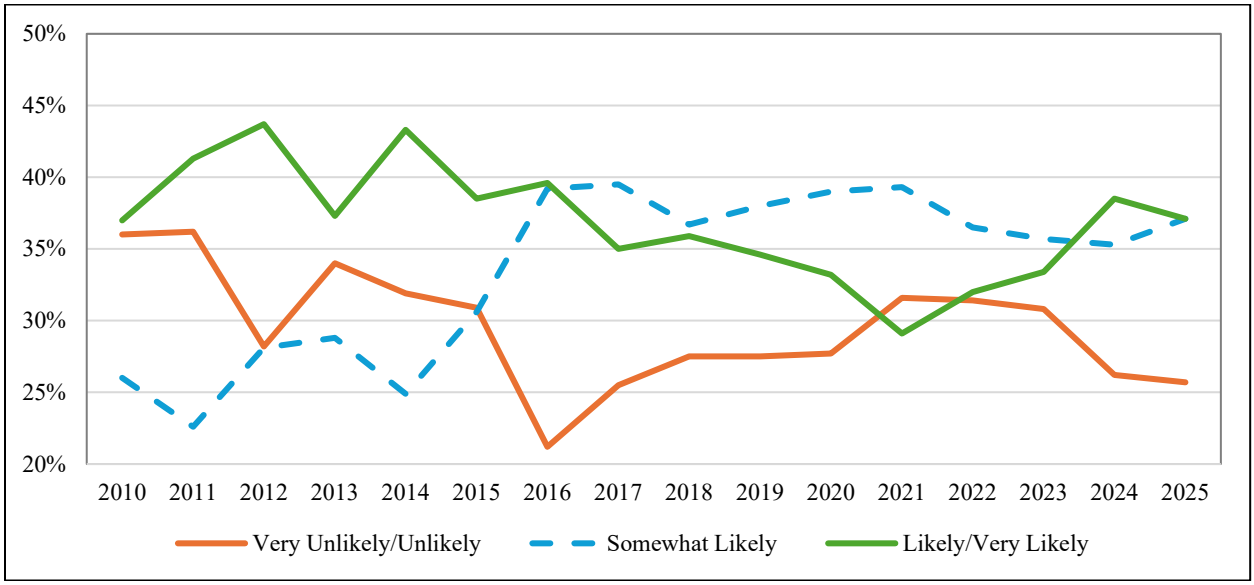

Figure 4.6 Chances of Getting a Ticket for No Seat Belt

One's perceived likelihood of receiving a ticket for speeding has generally declined since 2020 (Figure 4.7). As North Dakota transitions to a new speed limit of 80 miles per hour on interstate highways next year, it would behoove traffic safety practitioners to continue tracking self-reported speeding tendencies

and perceptions of ticket likelihood for speeding to see if the new speed limit is associated with changes in behaviors and/or perceptions as reported directly from drivers.

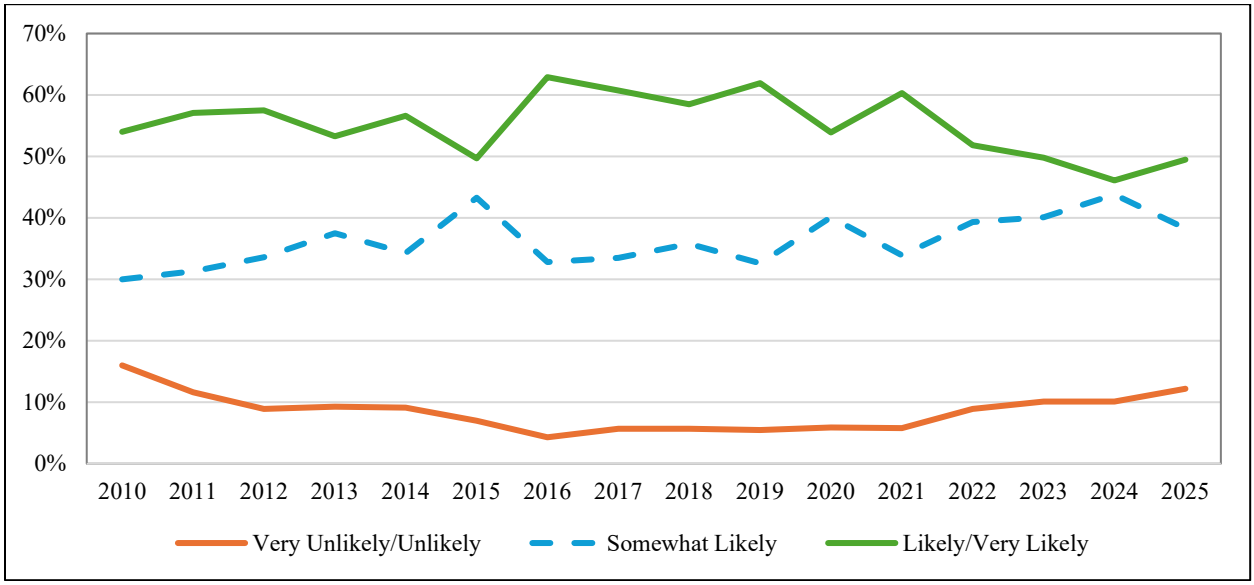

Figure 4.7 Chances of Getting a Ticket for Speeding

To further examine relationships among the core questions and issues that may be related, measures of association are calculated for responses. The Pearson coefficient measures the strength of association between two variables – in this case driver responses. Correlation coefficients range from -1 to +1, and values closer to these extremes are considered stronger relationships. Relationships between -0.5 and +0.5 are generally considered weak and inconsequential. For example, the "ticket for not wearing a seat belt" and "ticket for speeding" variables do have an expected positive relationship at Pearson corr.=0.477, but the correlation measure shows that less than 23% of their variability is shared. The Pearson correlation values suggest there are no strong relationships between survey items (Table 4.1).

Table 4.1 Correlations in Core Question Responses

	ID1a	ID1b	ID2	SB1	SB2	SP1	SP2
1D1a: Drive After Drinking 1–2 Drinks	1	.442** .000	-.135** .000	-.092** .000	-.141** .000	.177** .000	-.152** .000
ID1b: Drive After Drinking 3+ Drinks		1	-.083** .000	-.160** .000	-.075** .002	.099** .000	-.085** .001
ID2: Arrest for Drunk Driving			1	.013 .260	.470** .000	.018 .301	.462** .000
SB1: How Often Use Seat Belts				1	-.009 .203	-.065** .002	-.010 .489
SB2: Ticket for No Seat Belt					1	-.067** .000	.477** .000
SP1: Speed in 75 MPH Zone						1	-.113** .000
SP2: Ticket for Speeding							1

**Correlation is significant at the 1% level
Note: Correlations between -0.5 and +0.5 indicate a weak relationship and are not addressed in this study

Driver responses to other questions are presented in Table 4.2. These responses offer additional insight for practitioners and policymakers with queries related to traffic safety enforcement, education programs, policies, and investments. One aspect of traffic safety is deterrence through enforcement. The enforcement aspect combines patrol efforts and penalties to discourage drivers from taking part in dangerous or risky behaviors. The critical driver risk behaviors here are distracted driving, sober/designated drivers, driver beliefs, legislative changes, and exposure to enforcement messages.

Table 4.2 Other Question Responses

Survey Question	**Responses**				
Driver Distraction					
Do you favor or oppose…	St. Favor	Sw. Favor	Neutral	Sw. Oppose	St. Oppose
A ban on handheld phone use while driving?	39.9%	23.3%	15.1%	14.0%	7.7%
	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
Chances of distracted driving ticket?	10.6%	23.6%	36.8%	22.1%	6.8%
How likely to use phone while driving[1]?	8.5%	19.5%	34.5%	15.7%	21.7%
	Voice Call	Video Call	Text	Email	Social Media	Maps	Streaming	Other
Purpose[1,2]	73.4%	4.3%	24.8%	1.4%	3.3%	49.7%	2.8%	10.4%
	Yes	No						
Use is Bluetooth/hands-free[1]?	78.1%	21.9%						
Designated Driver								
	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely			
Likelihood designating alternate driver[3]?	60.1%	24.9%	6.6%	2.5%	5.9%			
		Sober Driver	Friend	Ride Share	Taxi			
Alternate service used[2,3]?		65.1%	45.2%	25.9%	3.6%			
Driver Beliefs								
	Yes	No						
Positive change in highway safety corridor[4]?	66.6%	33.4%						
	Always	N. Always	Sometimes	Rarely	Never			
Are crashes preventable?	6.3%	53.5%	40.0%	0.2%	0.1%			
Legislative Change			More Often	No Change	Less Often			
How often do you use a seat belt since primary seat belt law was enacted[5]?			16.7%	83.1%	0.1%			
Exposure to Messaging								
Within last six months, have you read, seen, or heard traffic safety messages related to…[6]				Yes	No			
Seat belt enforcement?				71.7%	28.3%			
Speed enforcement?				61.0%	39.0%			
Impaired driving enforcement?				76.9%	23.1%			
Distracted driving enforcement?				66.5%	33.5%			
Vision Zero?				47.9%	52.1%			

[1]Frequency does not include those who answered "I Do Not Use"
[2]Frequency based on each individual box checked; it is possible for respondents to check more than one box
[3]Frequency calculated based on those who do drink alcohol
[4]Frequency does not include those who answered "Do Not Know"
[5]Frequency excludes those who answered "Not Sure"
[6]Frequency calculated based on any read, seen, or heard exposure

4.1.1 Driver Distraction

Five questions specific to distracted driving were included in the survey. Although the term distracted driving can refer to a broad range of issues, the focus here is on cell phone use while driving. For the seventh consecutive year, North Dakota drivers were asked to rate their support for banning handheld cell phone use while driving. The majority (63.2%) indicated that they favored such a ban based on those who chose the "strongly favor" or "somewhat favor" options. This level of support represents a 3.4-percentage-point increase from the 2024 iteration of the survey and is the highest level of support in the seven years the question has been asked (Figure 4.8). The percentage of respondents who answered "strongly oppose" to this question (7.7%) was 0.4 percentage points lower than last year.

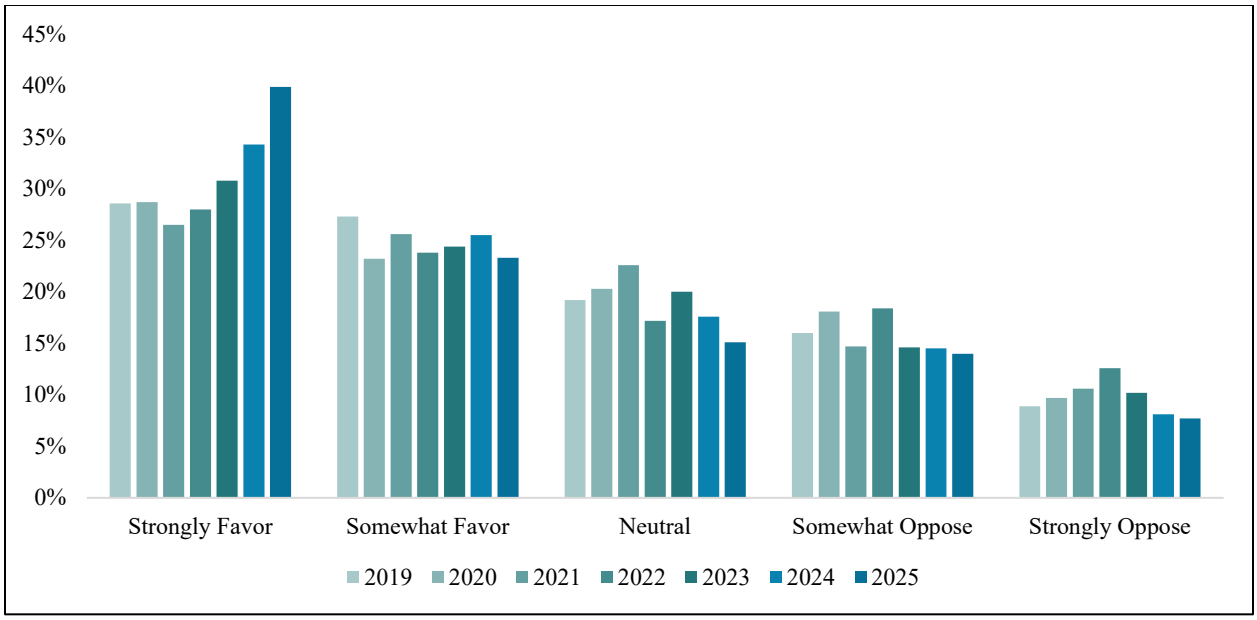

Figure 4.8 Driver Preferences for Banning Handheld Cell Phone Use while Driving

Just 12.2% of drivers self-reported that they do not use a phone while driving. Of those who do use their phone, there was an even distribution of responses when asked to rate the likelihood of using it while driving: roughly one-third of respondents (28.0%) self-reported that they were "likely" or "very likely" to use a phone, roughly one-third (34.5%) indicated usage as "somewhat likely," and roughly one-third (37.4%) answered that the chances were "very unlikely" or "unlikely" that they would engage in this dangerous behavior.

Among those who do use cell phones while driving, when asked specifically for which purposes the respondents use cell phones, voice calls were cited as the most common use with 73.4% self-reporting this behavior. A lower proportion, 24.8%, indicated that they use phones to text while driving. This is a notable decline from the 40.6% and 29.6% of drivers who self-reported texting-while-driving behavior in 2023 and 2024, respectively.

For the fourth consecutive year, drivers were asked whether their cell phone use while driving occurs via hands-free/Bluetooth technology. Of those using a phone while driving, roughly three of four (78.1%) do so by leveraging hands-free technology. This represents a 0.8-percentage-point increase from 2024.

The expectations North Dakota drivers have for receiving a ticket for distracted driving closely resemble a bell curve (Figure 4.9). Drivers tend to believe that a ticket for this dangerous behavior is just as unlikely as it is likely.

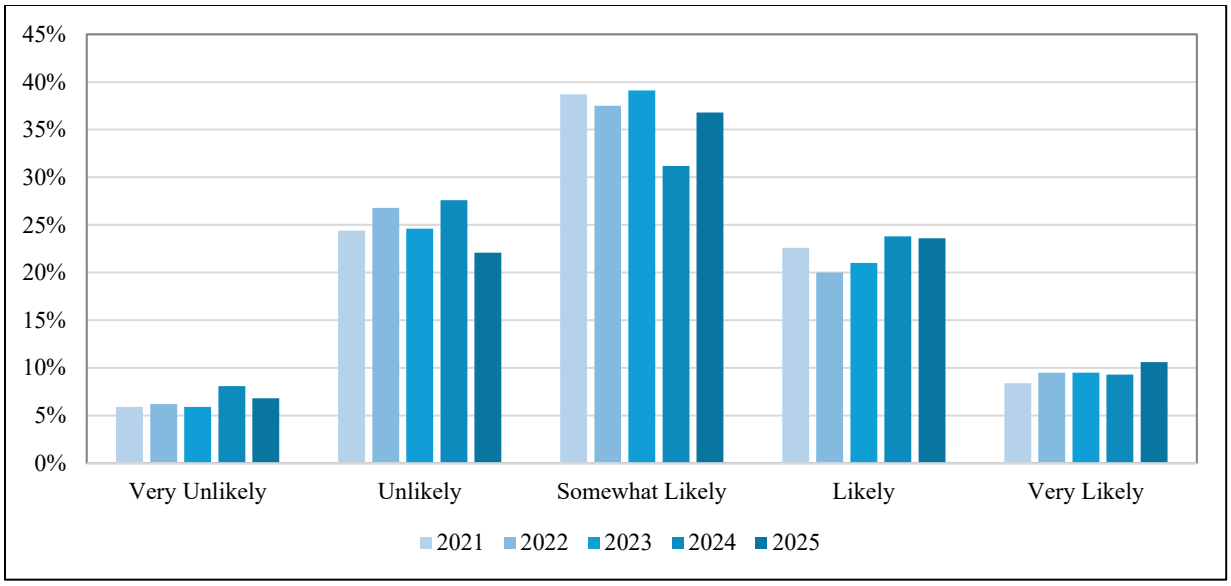

Figure 4.9 Perceived Likelihood of Receiving a Ticket for Distracted Driving

4.1.2 Sober/Designated Drivers

Among those respondents who do drink alcohol, 60.1% reported that they are very likely to designate an alternate driver when drinking or planning to drink. This was a 1.0-percentage-point decrease from the 61.1% who reported this last year. The share of respondents self-reporting that they were very unlikely to designate an alternate driver was 5.9%. This was an increase from the 3.8% who held this viewpoint in 2024. Although the 2025 percentage of those unlikely to designate an alternate driver (5.9%) has not changed significantly from those in 2014 who reported never using an alternate driver (5.4%), substantial gains have been made at the other end of the spectrum. Whereas just 41.6% reported always using an alternate driver in 2014, 60.1% reported being very likely to do so in 2025 (Figure 4.10).

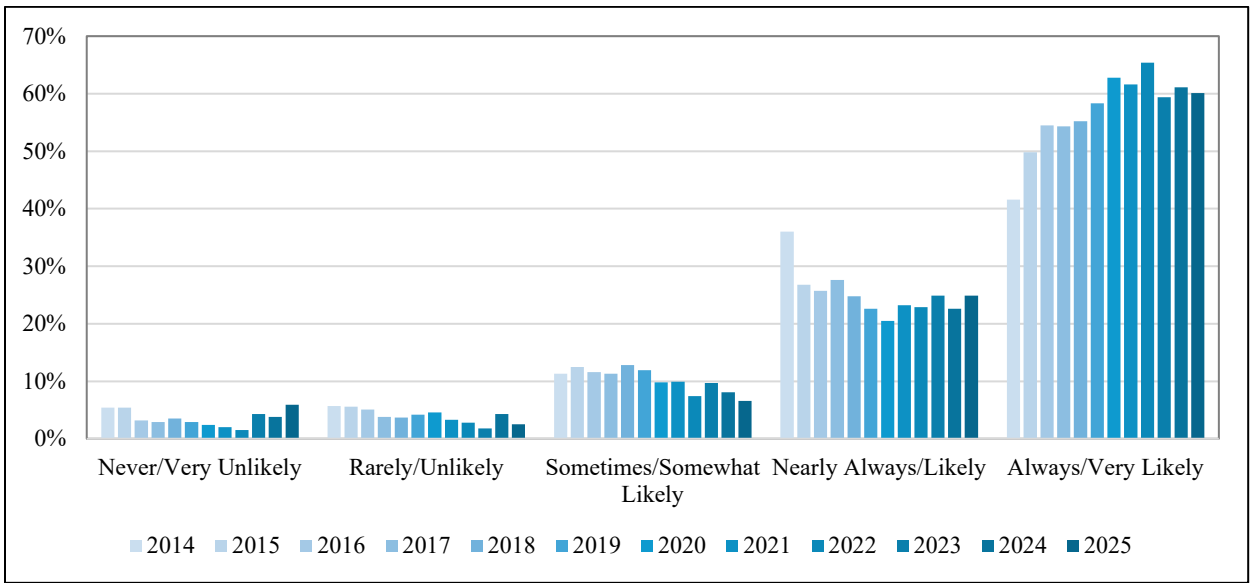

Figure 4.10 Likelihood of Designating an Alternate Driver

Drivers were asked a question to understand which type of alternate driver is used by those who do not drive when drinking alcohol. Among those individuals who designate an alternate driver, they most commonly designate a sober driver in the group (65.1%). A smaller share, 45.2%, call a friend or family member for a ride. Ride sharing services (25.9%) and taxis (3.6%) were least commonly used among respondents. These patterns have been stable in the three consecutive years the question has been asked (Figure 4.11). Note that respondents could choose more than one option to this question, and each individual category reported here is inclusive of any combination of options on the survey.

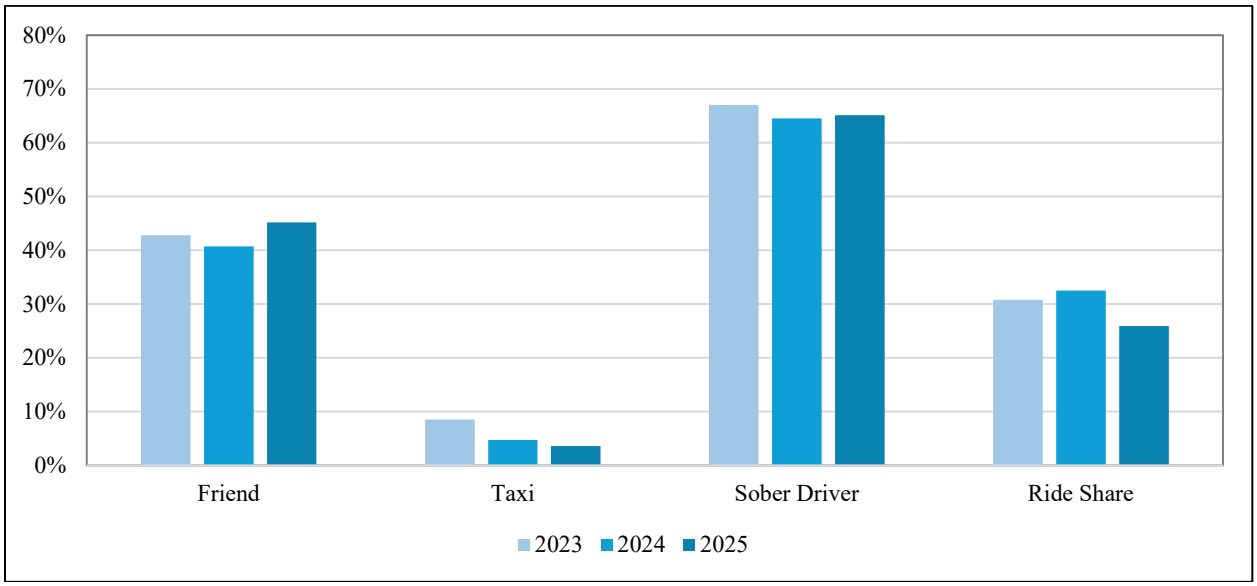

Figure 4.11 Alternate Service Used

4.1.3 Driver Beliefs

For the first time since 2023, drivers were asked whether they positively change their behaviors upon driving through a highway safety corridor. Two-thirds (66.6%) reported that they do change their driving for the better, but this was the lowest percentage since this question was originally asked (Figure 4.12).

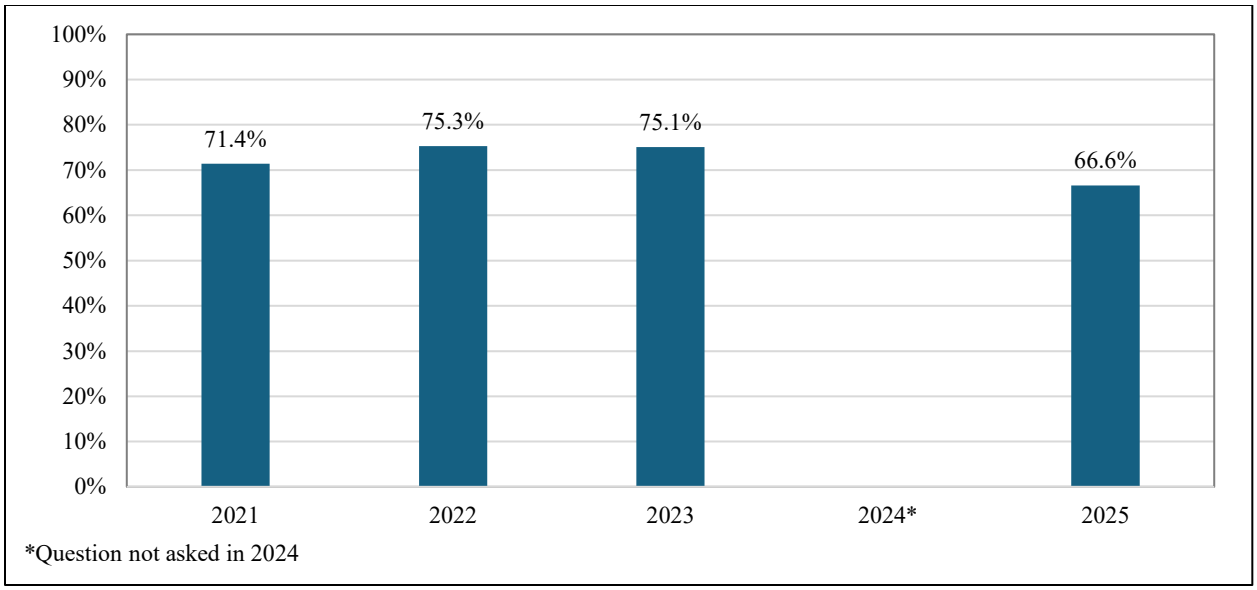

Figure 4.12 Drivers Positively Changing Behavior in Highway Safety Corridor

Sentiments regarding whether crashes are preventable have remained largely the same (Figure 4.13). In the three surveys in which the question has been asked, the majority of respondents rated crashes as either "nearly always" or "always" being preventable.

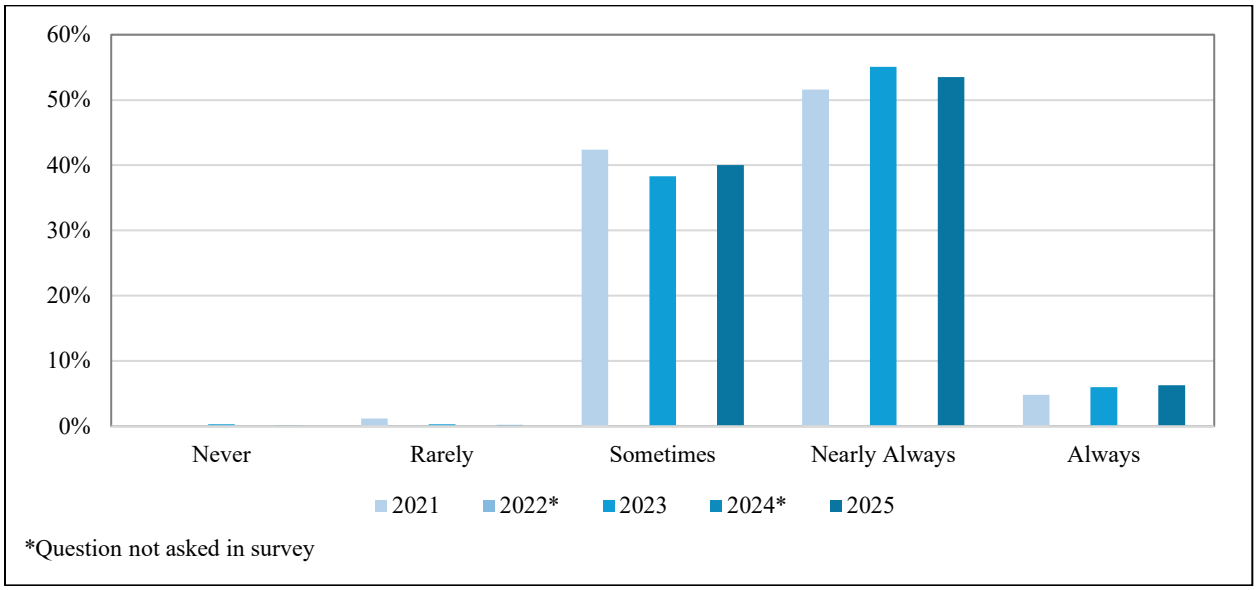

Figure 4.13 Driver Beliefs Regarding Whether Crashes are Preventable

4.1.4 Legislative Changes

For the second consecutive year, a question asked survey participants to self-report their seat belt use now that a new primary seat belt law has been enacted. About five in six (83.1%) indicated that their seat belt use is the same as it was before legislation was passed. However, 16.7% self-reported that their seat belt use increased after the new law took effect. This number grew from the 12.2% who reported this last year. Increases were largest among the following driver groups: 31.5% of drivers over age 75 wore a seat belt more often, 21.1% of male drivers wore a seat belt more often, 17.1% of respondents living in eastern

counties worse a seat belt more often, and 16.9% of drivers from urban counties self-reported wearing seat belts more often.

There was one notable decline, however, when disaggregating demographic groups. Whereas in 2024 about one in five (19.7%) drivers 18-to-24-year-old self-reported wearing a seat belt more often after the legislative change, just 7.8% reported this in 2025. No other demographic group declined by more than one percentage point.

4.1.5 Exposure to Messaging

Responses to educational messaging reveal that drivers most often read, see, or hear messages pertaining to impaired driving (Figure 4.14). More than three in four drivers (76.9%) reported some capacity of exposure to messages about impaired driving in the last six months. Messages pertaining to seat belt use were recently read, seen, or heard by nearly three in four (71.7%) North Dakota drivers, and educational content regarding distracted driving was self-reported by approximately two in three (66.5%) drivers. These percentages are in line with prior iterations of this survey in which these three topics – impaired driving, seat belt use, and distracted driving – were most read, seen, or heard.

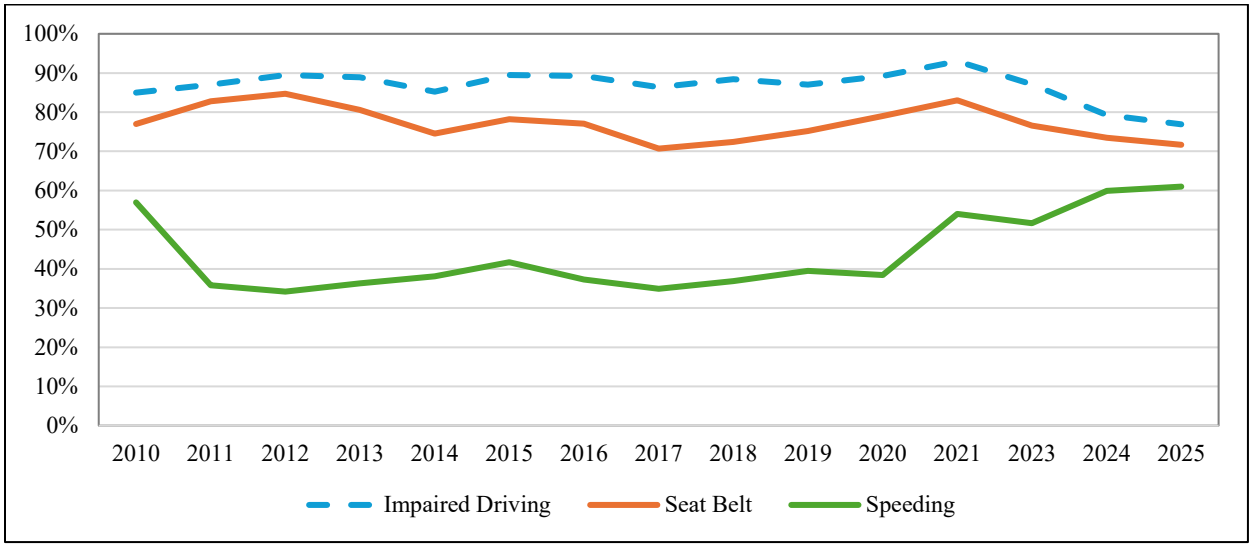

Figure 4.14 Exposure to Messaging Within Last Six Months

The relationship between education and enforcement is mixed. One would expect a positive relationship to occur: if one has had more recent exposure to safety messaging, one should believe the chances of receiving a ticket for illicit behavior to be higher. This expected relationship occurs for impaired driving. Drivers most often read, hear, or see messages related to this topic and subsequently believe chances are highest for receiving a ticket for this negative behavior. However, this relationship does not take place for the other metrics. Although messages pertaining to speeding were least often read, seen, or heard by drivers, they nonetheless self-reported expecting a ticket for this behavior more often than they expected to receive a ticket for not wearing a seat belt (Figure 4.15).

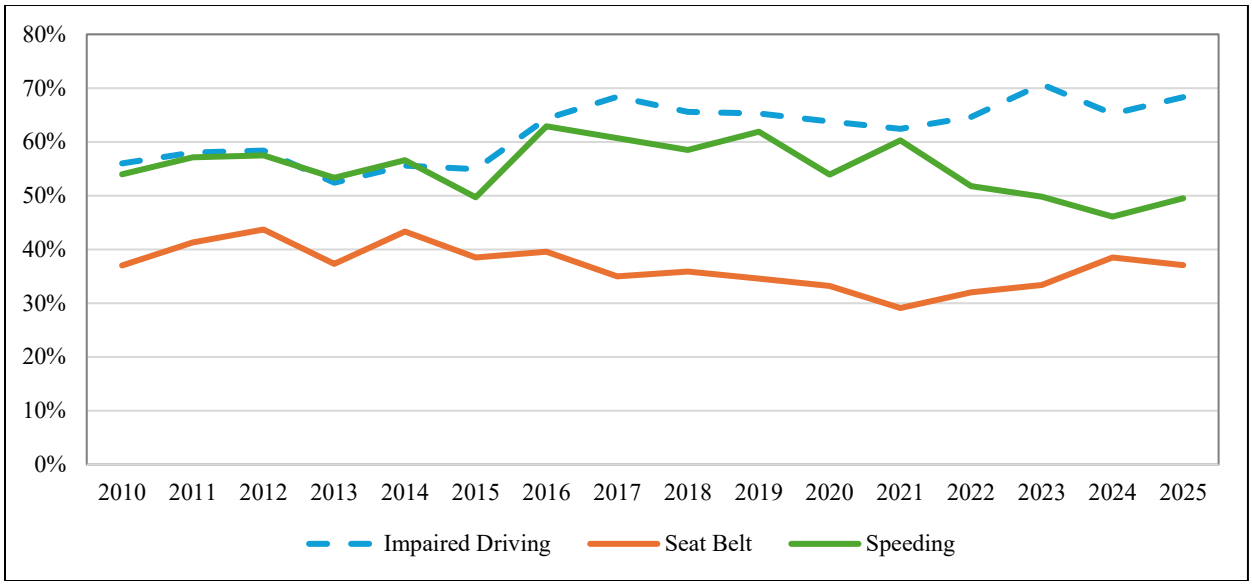

Figure 4.15 Perceived Likelihood of Receiving a Ticket for Illicit Behavior

4.2 Driver Group Evaluations

It is reasonable to assume that driver perceptions and behaviors are influenced by local norms and the driving environment. Therefore, it is prudent to investigate differences within the driver population to determine if perceptions can be substantiated. This information may be valuable in more effectively allocating traffic safety resources, conducting program assessments, and focusing programs and strategies beyond typical statewide treatment. Numeric values are assigned to the descriptive answers to create ordinal scales to efficiently quantify and manage the discussion of driver responses in the strata. These transformations also allow for expanded statistical analysis of responses. The quantitative scale definitions are provided in Table 4.3.

Table 4.3 Quantitative Scale Definitions for Responses

Q#	Question	Scale	Conversion Values
SB1	Seat Belt Use	1-5	1=Never to 5=Always
SB3	Ticket Likely Seat Belt	1-5	1=Very Unlikely to 5=Very Likely
SP1	Speed in 75 MPH Zone	1-5	1=Never to 5=Always
SP2	Chance of Speeding Ticket	1-5	1=Very Unlikely to 5=Very Likely
ID1	Chance Arrest Impaired Driving	1-5	1=Very Unlikely to 5=Very Likely
ID2a	Alternate Driver	0-5	0=Very Unlikely to 5=Very Likely
ID3a	Drive After Drinking 1–2 Drinks	0-1	0=None, 1=At Least Once
ID3b	Drive After Drinking 3+ Drinks	0-1	0=None, 1=At Least Once
DD1	Handheld Cell Phone Ban	1-5	1=Strongly Oppose to 5=Strongly Favor
DD2	Distracted Driving Ticket	1-5	1=Very Unlikely to 5=Very Likely
DD3	Use Phone Driving	1-5	1=Very Unlikely to 5=Very Likely
VZ1a	RSH Seat Belt	0-1	0=No Exposure, 1=Exposed by Source(s)
VZ1b	RSH Speed	0-1	0=No Exposure, 1=Exposed by Source(s)
VZ1c	RSH Drunk Driving	0-1	0=No Exposure, 1=Exposed by Source(s)
VZ1d	RSH Distracted Driving	0-1	0=No Exposure, 1=Exposed by Source(s)
VZ1e	RSH *Vision Zero*	0-1	0=No Exposure, 1=Exposed by Source(s)

Stratification in sampling the driver population provides an opportunity to look at the drivers based on region and geography as defined in the methods section. In addition, the young male and female driver groups can be distinguished as high-risk populations. Insights regarding impaired driving, seat belts, and speed across these strata may benefit traffic safety advocates by enhancing their ability to focus efforts. The information may also be useful in assessing the value of including these types of stratification in future surveys.

4.2.1 Regional and Geographic Observations

Table 4.4 shows the mean values for drivers surveyed statewide, along with regional and geographic comparisons. Statewide survey averages indicate that drivers' views and behaviors associated with traffic safety goals have potential for improvement as discussed in the descriptive statistics. For example, seat belt use is at a mean of 4.76. This number is below the goal of 5.00, which is equivalent to always in the driver survey response.

Regional and geographic strata were tested for significant differences. In all, two issues were statistically significant by region, and six issues were statistically significant by geographic comparisons.

Results were mixed when factoring for regional designation. Drivers from the eastern half of the state were more likely to have been exposed to messaging about drunk driving enforcement (Chi-Sq.=5.312, df=1, p=0.021). However, these same drivers were less likely to have had exposure to messaging about the *Vision Zero* safety campaign (Chi-Sq.=19.919, df=1, p<0.001). No other survey items had statistically significant differences when factoring for one's regional location in the state.

With regard to geographic classifications, one ongoing trend is the substantial discrepancy in seat belt use between urban and rural drivers. North Dakota drivers living in the five urban counties are more likely to use a seat belt (F=57.642, df=1, p<0.001). Compared with rural drivers, the higher seat belt use among urban residents continues a trend that has been in place each year since 2010. Although both subcategories are under the goal of a mean value of 5.00, rural residents are farther away from this target number. This occurred even though rural drivers believe the likelihood of being ticketed for not wearing a seat belt is higher than their urban counterparts (F=11.437, df=1, p<0.001). Further, this occurred even though rural drivers had more recent exposure to traffic safety messages about seat belt use (Chi-Sq.=4.091, df=1, p=0.043). Evidently, neither the perceived threat of a ticket nor the exposure from educational messaging are sufficient deterrents for negative behavior. It is plausible that higher fines for driving while unbelted may increase use among these respondents.

Rural drivers continue to have noticeable differences when compared with urban drivers for speeding. These respondents self-reported speeding on a 75-mile-per-hour roadway more often than did urban drivers (F=19.498, df=1, p<0.001). This continues a trend that has been in place since 2017.

Another pattern occurred for distracted driving: rural respondents were less supportive of a ban on handheld devices while driving (F=19.966, df=1, p<0.001) even though they were more likely to have had recent exposure to safety messages about distracted driving (Chi-Sq.=7.778, df=1, p=0.005).

Table 4.4 Differences in Mean Driver Views and Behaviors, by Region and Geography

		Statewide	Region			Geography		
Question	Scale[1]	All	East	West	Sig.	Urban	Rural	Sig.
Seat Belt Use	1–5	4.76	4.77	4.74		4.83	4.52	##
Ticket Likely Seat Belt	1–5	3.18	3.21	3.12		3.14	3.29	##
Speed in 75 MPH Zone	1–5	2.25	2.21	2.30		2.24	2.29	##
Chance of Speeding Ticket	1–5	3.46	3.42	3.51		3.44	3.53	
Chance Arrest Impaired Driving	1–5	3.97	3.96	3.99		3.97	3.97	
Alternate Driver	0–5	4.31	4.25	4.40		4.36	4.15	
Drive After Drinking 1–2 Drinks	0–1	0.34	0.33	0.35		0.34	0.34	
Drive After Drinking 3+ Drinks	0–1	0.05	0.06	0.04		0.05	0.06	
Handheld Cell Phone Ban	1–5	3.74	3.83	3.60		3.82	3.45	##
Distracted Driving Ticket	1–5	3.09	3.10	3.08		3.07	3.16	
Use Phone Driving	1–5	2.77	2.70	2.88		2.69	3.02	
RSH Seat Belt	0–1	0.72	0.72	0.71		0.71	0.73	*
RSH Speed	0–1	0.61	0.62	0.59		0.60	0.64	
RSH Drunk Driving	0–1	0.77	0.81	0.71	*	0.77	0.76	
RSH Distracted Driving	0–1	0.66	0.70	0.62		0.64	0.74	**
RSH *Vision Zero*	0–1	0.48	0.41	0.58	**	0.47	0.52	

[1]Note: Nominal/Ordinal scales require different tests of significance
*Significant difference at the 5% level for Pearson Chi-Square test
**Significant difference at the 1% level for Pearson Chi-Square test
##Significant difference at 1% level for 1-way ANOVA

Table 4.5 shows the change in mean values from 2010 to 2025. The primary reason to include the values here is to establish a statewide baseline for the discussion of respondent groups. The figures may also be useful measures in monitoring statewide progress over time. With 16 years of data available, some conclusions can be made. For instance, the five-year average of seat belt use (4.75) is at an all-time high. Similarly, the five-year averages for perceptions of being arrested for drunk driving are at all-time highs for all driver groups. Conversely, a negative trend becomes apparent when analyzing results from the previous 16 years. The five-year average measuring the perceived likelihood of receiving a ticket for speeding is at an all-time low for all driver groups. There is room for education and/or enforcement to change this perception.

Table 4.5 Differences in Driver Views and Behaviors from 2010–2025, by Region and Geography

			Statewide	Region			Geography			Core
Question	Year	Scale	All	East	West	Sig.	Urban	Rural	Sig.	Y/N
Seat Belt Use	2025	1–5	4.76	4.77	4.74		4.83	4.52	**	Y
1=Never to 5=Always	2024		4.79	4.82	4.75		4.83	4.65	**	Y
	2023		4.76	4.76	4.76		4.83	4.56	**	Y
	2022		4.75	4.74	4.76		4.82	4.51	**	Y
	2021		4.69	4.73	4.64		4.75	4.50	**	Y
	2020		4.69	4.74	4.62		4.77	4.48	**	Y
	2019		4.69	4.69	4.68		4.77	4.43	**	Y
	2018		4.72	4.72	4.71		4.78	4.52	**	Y
	2017		4.66	4.69	4.63		4.73	4.46	**	Y
	2016		4.66	4.70	4.61		4.73	4.44	**	Y
	2015		4.61	4.64	4.59		4.68	4.44	**	Y
	2014		4.61	4.63	4.58		4.67	4.40	**	Y
	2013		4.47	4.44	4.50	*	4.54	4.36	**	Y
	2012		4.31	4.37	4.24	*	4.40	4.23	**	Y
	2011		4.42	4.44	4.36	**	4.52	4.21	**	Y
	2010		4.36	4.38	4.36		4.49	4.08	**	Y
2021–2025 Five-Year Average			**4.75**	**4.76**	**4.73**		**4.81**	**4.55**		
2020–2024 Five-Year Average			**4.74**	**4.76**	**4.71**		**4.80**	**4.54**		
2019–2023 Five-Year Average			**4.72**	**4.73**	**4.69**		**4.79**	**4.50**		
2018–2022 Five-Year Average			**4.71**	**4.72**	**4.68**		**4.78**	**4.49**		
2017–2021 Five-Year Average			**4.69**	**4.71**	**4.66**		**4.76**	**4.48**		
2016–2020 Five-Year Average			**4.68**	**4.71**	**4.65**		**4.76**	**4.47**		
2015–2019 Five-Year Average			**4.67**	**4.69**	**4.64**		**4.74**	**4.46**		
2014–2018 Five-Year Average			**4.65**	**4.68**	**4.62**		**4.72**	**4.45**		
2013–2017 Five-Year Average			**4.60**	**4.62**	**4.58**		**4.67**	**4.42**		
2012–2016 Five-Year Average			**4.53**	**4.56**	**4.50**		**4.60**	**4.37**		
2011–2015 Five-Year Average			**4.48**	**4.50**	**4.45**		**4.56**	**4.33**		
2010–2014 Five-Year Average			**4.43**	**4.45**	**4.41**		**4.52**	**4.26**		
Ticket Likely Seat Belt	2025	1–5	3.18	3.21	3.12		3.14	3.29	**	Y
1=Very Unlikely to 5=Very Likely	2024		3.23	3.32	3.09		3.23	3.23		Y
	2023		3.05	3.08	3.02		3.03	3.11		Y
	2022		3.03	3.04	3.02		3.04	3.02		Y
	2021		3.01	3.10	2.88	*	3.00	3.04		Y
	2020		3.09	3.12	3.04		3.09	3.08	**	Y
	2019		3.15	3.18	3.09	*	3.13	3.19		Y
	2018		3.17	3.14	3.21		3.16	3.21	*	Y
	2017		3.15	3.17	3.12		3.14	3.15	*	Y
	2016		3.29	3.27	3.31		3.26	3.37	**	Y
	2015		3.29	3.38	3.19		3.27	3.35	**	Y
	2014		3.20	3.26	3.14		3.19	3.25	*	Y
	2013		3.17	3.18	3.15		3.10	3.17	**	Y
	2012		3.16	3.24	3.06	*	3.10	3.22		Y
	2011		2.98	2.93	3.10		2.94	3.06		Y
	2010		3.06	3.07	3.04		3.03	3.13		Y
2021–2025 Five-Year Average			**3.10**	**3.15**	**3.03**		**3.09**	**3.14**		
2020–2024 Five-Year Average			**3.08**	**3.13**	**3.01**		**3.08**	**3.10**		
2019–2023 Five-Year Average			**3.07**	**3.10**	**3.01**		**3.06**	**3.09**		
2018–2022 Five-Year Average			**3.09**	**3.12**	**3.05**		**3.08**	**3.11**		
2017–2021 Five-Year Average			**3.11**	**3.14**	**3.07**		**3.10**	**3.13**		
2016–2020 Five-Year Average			**3.17**	**3.18**	**3.15**		**3.16**	**3.20**		
2015–2019 Five-Year Average			**3.21**	**3.23**	**3.18**		**3.19**	**3.25**		
2014–2018 Five-Year Average			**3.22**	**3.24**	**3.19**		**3.20**	**3.27**		
2013–2017 Five-Year Average			**3.22**	**3.25**	**3.18**		**3.19**	**3.26**		
2012–2016 Five-Year Average			**3.22**	**3.27**	**3.17**		**3.18**	**3.27**		
2011–2015 Five-Year Average			**3.16**	**3.20**	**3.13**		**3.12**	**3.21**		
2010–2014 Five-Year Average			**3.11**	**3.14**	**3.10**		**3.07**	**3.17**		

	Year	Scale	Statewide	Region			Geography			Core
			All	East	West	Sig.	Urban	Rural	Sig.	Y/N
Speed 75 MPH Zone	2025	1–5	2.25	2.21	2.30		2.24	2.29	**	Y
1=Never to 5=Always	2024		2.21	2.13	2.32		2.18	2.33	*	Y
	2023		2.29	2.25	2.36		2.26	2.37	**	Y
	2022		2.28	2.19	2.41		2.27	2.31	**	Y
	2020		2.19	2.13	2.27		2.20	2.16	**	Y
	2019		2.11	2.05	2.19		2.12	2.07	**	Y
	2018		2.14	2.04	2.26		2.15	2.09	**	Y
	2017		2.17	2.08	2.28		2.22	2.02	**	Y
2020–2025 Five-Year Average			**2.24**	**2.18**	**2.33**		**2.23**	**2.29**		
2019–2024 Five-Year Average			**2.22**	**2.15**	**2.31**		**2.21**	**2.25**		
2018–2023 Five-Year Average			**2.20**	**2.13**	**2.30**		**2.20**	**2.20**		
2017–2022 Five-Year Average			**2.18**	**2.10**	**2.28**		**2.19**	**2.13**		
Ticket Likely Speed	2025	1–5	3.46	3.42	3.51		3.44	3.53		Y
1=Very Unlikely to 5=Very Likely	2024		3.49	3.49	3.48		3.46	3.59	*	Y
	2023		3.51	3.47	3.57		3.47	3.60	*	Y
	2022		3.56	3.56	3.56		3.54	3.61		Y
	2021		3.67	3.65	3.71		3.64	3.79	*	Y
	2020		3.61	3.56	3.68	**	3.59	3.65	**	Y
	2019		3.75	3.75	3.74		3.72	3.83	**	Y
	2018		3.69	3.64	3.76		3.76	3.67	**	Y
	2017		3.69	3.67	3.72	*	3.67	3.75	**	Y
	2016		3.79	3.76	3.81		3.76	3.87	**	Y
	2015		3.84	3.82	3.87	*	3.84	3.84		Y
	2014		3.72	3.71	3.73		3.71	3.77	**	Y
	2013		3.67	3.66	3.68	*	3.63	3.67		Y
	2012		3.69	3.71	3.66		3.62	3.76	*	Y
	2011		3.62	3.61	3.66		3.76	3.62	*	Y
	2010		3.59	3.61	3.58		3.60	3.58		Y
2021–2025 Five-Year Average			**3.54**	**3.52**	**3.57**		**3.51**	**3.62**		
2020–2024 Five-Year Average			**3.57**	**3.55**	**3.60**		**3.54**	**3.65**		
2019–2023 Five-Year Average			**3.62**	**3.60**	**3.65**		**3.59**	**3.70**		
2018–2022 Five-Year Average			**3.66**	**3.63**	**3.69**		**3.65**	**3.71**		
2017–2021 Five-Year Average			**3.68**	**3.65**	**3.72**		**3.68**	**3.74**		
2016–2020 Five-Year Average			**3.71**	**3.68**	**3.74**		**3.70**	**3.75**		
2015–2019 Five-Year Average			**3.75**	**3.73**	**3.78**		**3.75**	**3.79**		
2014–2018 Five-Year Average			**3.75**	**3.72**	**3.78**		**3.75**	**3.78**		
2013–2017 Five-Year Average			**3.74**	**3.72**	**3.76**		**3.72**	**3.78**		
2012–2016 Five-Year Average			**3.74**	**3.73**	**3.75**		**3.71**	**3.78**		
2011–2015 Five-Year Average			**3.71**	**3.70**	**3.72**		**3.71**	**3.73**		
2010–2014 Five-Year Average			**3.66**	**3.66**	**3.66**		**3.66**	**3.68**		

			Statewide	Region			Geography			Core
	Year	Scale	All	East	West	Sig.	Urban	Rural	Sig.	Y/N
Arrest for DUI	2025	1–5	3.97	3.96	3.99		3.97	3.97		Y
1=Very Unlikely to 5=Very Likely	2024		3.92	3.90	3.95		3.90	3.98		Y
	2023		4.03	3.99	4.09		4.00	4.09		Y
	2022		3.93	3.89	3.98		3.90	4.03		Y
	2021		3.82	3.85	3.77		3.81	3.86		Y
	2020		3.87	3.84	3.91		3.87	3.87		Y
	2019		3.88	3.90	3.86		3.90	3.85		Y
	2018		3.89	3.83	3.97		3.90	3.87		Y
	2017		3.94	3.90	4.00		3.92	4.02		Y
	2016		3.89	3.86	3.93		3.89	3.90		Y
	2015		3.86	3.90	3.80		3.84	3.89		Y
	2014		3.76	3.71	3.83		3.79	3.69		Y
	2013		3.53	3.54	3.52		3.51	3.53		Y
	2012		3.64	3.67	3.60		3.68	3.61		Y
	2011		3.62	3.61	3.69		3.63	3.65		Y
	2010		3.53	3.59	3.47		3.55	3.49		Y
2021–2025 Five-Year Average			**3.93**	**3.92**	**3.96**		**3.92**	**3.99**		
2020–2024 Five-Year Average			**3.91**	**3.89**	**3.94**		**3.90**	**3.97**		
2019–2023 Five-Year Average			**3.91**	**3.89**	**3.92**		**3.90**	**3.94**		
2018–2022 Five-Year Average			**3.88**	**3.86**	**3.90**		**3.88**	**3.90**		
2017–2021 Five-Year Average			**3.88**	**3.86**	**3.90**		**3.88**	**3.89**		
2016–2020 Five-Year Average			**3.89**	**3.87**	**3.93**		**3.90**	**3.90**		
2015–2019 Five-Year Average			**3.89**	**3.88**	**3.91**		**3.89**	**3.91**		
2014–2018 Five-Year Average			**3.87**	**3.84**	**3.91**		**3.87**	**3.87**		
2013–2017 Five-Year Average			**3.80**	**3.78**	**3.82**		**3.79**	**3.81**		
2012–2016 Five-Year Average			**3.74**	**3.74**	**3.74**		**3.74**	**3.72**		
2011–2015 Five-Year Average			**3.68**	**3.69**	**3.69**		**3.69**	**3.67**		
2010–2014 Five-Year Average			**3.62**	**3.62**	**3.62**		**3.63**	**3.59**		

*Statistically significant difference at the 5% level
**Statistically significant difference at the 1% level

4.2.2 Young Male Driver Group

As with the previous surveys, the selected target group of 18–34-year-old high-risk males (HRM) shows significantly different behaviors, exposure levels, and views when compared with other drivers (Table 4.6). (Note that high-risk females were not included in the "other" group. See Section 4.2.3 for results for high-risk females.) In terms of behavior, high-risk male drivers in this survey are more likely to exhibit behaviors at odds with traffic safety goals such as speeding on a 75-mile-per-hour roadway ($F=34.054$, $df=1$, $p<0.001$), driving within two hours of consuming three or more alcoholic beverages (Chi-Sq.=7.691, $df=1$, $p=0.006$), and using a phone when driving ($F=9.397$, $df=1$, $p=0.002$).

In addition to having higher levels of risky behavior compared with the rest of the North Dakota driver population, the high-risk driver group is less likely to support policies and/or legislation that encourage safe operating behaviors. This group had substantially lower levels of support for banning handheld phone use while driving ($F=14.683$, $df=1$, $p<0.001$).

Interestingly, these dangerous behaviors and beliefs occur despite the target group seeing safety messages about *Vision Zero* at a higher rate than the balance of the population (Chi-Sq.=4.401, $df=1$, $p=0.036$). This suggests that while messages are reaching the target group, they may be ineffective.

Table 4.6 Differences in Driver Views and Behaviors, Young Male Target Group

Question	HRM (n=163)	Other Drivers (n=1,230)	Sig.[1]
Seat Belt Use	4.59	4.77	
Ticket Seat Belt	2.99	3.15	
Speed in 75 MPH Zone	2.50	2.00	##
Ticket Likely Speeding	3.32	3.34	
Chance Arrest for DUI	3.96	3.85	#
Use Alternate Sober Driver	4.20	4.22	
Drive After 1–2 Drinks	0.48	0.34	
Drive After 3+ Drinks	0.17	0.06	**
Ban Handheld Cell Use	3.25	3.88	##
Ticket Distracted Driving	3.00	2.97	
Use Phone While Driving	2.97	2.54	##
RSH Seat Belt	0.75	0.72	
RSH Speeding	0.58	0.62	
RSH Drunk Driving	0.78	0.78	
RSH Distracted Driving	0.64	0.68	
RSH *Vision Zero*	0.61	0.44	*

[1]Note: Nominal/Ordinal scales require different tests of significance
**Significant difference at the 1% level for Pearson Chi-Square test
*Significant difference at the 5% level for Pearson Chi-Square test
##Significant difference at the 1% level for 1-way ANOVA
#Significant difference at the 5% level for 1-way ANOVA

Table 4.7 compares the responses of high-risk young males with all other driver groups. It is clear that there are differences in views, behaviors, and attitudes toward various transportation safety topics. The complete list of survey questions is provided in Appendix A.

Table 4.7 Responses for High-Risk Male Drivers

Question		**Responses, by Driver Group**				
Seat Belt Use	n=1,391	Always	N. Always	Sometimes	Rarely	Never
	Other	83.1%	13.0%	2.6%	0.9%**	0.5%**
	HRM	70.6%	20.7%	6.6%**	1.2%**	1.0%**
Ticket Seat Belt	n=1,389	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	Other	13.9%	21.7%	37.9%	18.1%	8.4%
	HRM	11.7%**	21.2%	30.9%	27.3%	9.0%**
Speed 75 MPH Zone	n=1,386	Always	N. Always	Sometimes	Rarely	Never
	Other	1.5%**	5.5%	16.6%	43.7%	32.6%
	HRM	4.6%**	14.3%**	25.4%	37.8%	17.9%**
Ticket Speeding	n=1,387	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	Other	10.4%	32.6%	43.0%	8.5%	5.5%
	HRM	10.8%**	27.2%	46.4%	14.6%**	1.0%**
Chance Arrest Impaired	n=1,382	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	Other	32.1%	29.8%	30.9%	5.3%	1.8%
	HRM	37.5%	32.5%	19.7%**	8.6%**	1.7%**
Alternate Driver[1]	n=900	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	Other	56.2%	26.4%	7.0%	3.9%**	6.5%
	HRM	51.7%	27.0%	12.8%**	6.3%**	2.2%**
Drive After 1–2 Drinks	n=953	None	1-5 Times	6-10 Times	11+ Times	
	Other	65.9%	30.6%	2.5%**	0.9%**	
	HRM	51.7%	38.0%	5.1%**	5.2%**	
Drive After 3+ Drinks	n=814	None	1-5 Times	6-10 Times	11+ Times	
	Other	93.8%	5.2%	0.4%**	0.6%**	
	HRM	83.0%	14.3%**	0.4%**	2.3%**	
Ban Handheld Phone	n=1,385	St. Favor	Sw. Favor	Neutral	Sw. Oppose	St. Oppose
	Other	48.4%	19.6%	11.8%	11.5%	8.7%
	HRM	23.3%	21.8%	26.2%	14.3%**	14.4%**
Distracted Driving Ticket	n=1,373	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	Other	10.3%	19.0%	37.1%	24.7%	9.0%
	HRM	12.6%**	21.6%	28.6%	27.5%	9.8%**
Use Phone While Driving[2]	n=1,173	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	Other	8.5%	13.2%	31.9%	16.7%	29.6%
	HRM	8.0%**	28.1%	30.8%	19.3%	13.7%**
RSH Seat Belt	n=1,325	Yes	No			
	Other	71.7%	28.3%			
	HRM	74.9%	25.1%			
RSH Speeding	n=1,282	Yes	No			
	Other	61.8%	38.2%			
	HRM	58.3%	41.7%			
RSH Drunk	n=1,316	Yes	No			
	Other	78.4%	21.6%			
	HRM	78.5%	21.5%			
RSH Distracted	n=1,302	Yes	No			
	Other	67.7%	32.3%			
	HRM	63.7%	36.3%			
RSH *Vision Zero*	n=1,248	Yes	No			
	Other	44.4%	55.6%			
	HRM	60.6%	39.4%			

Note: Please see Appendix A for exact question and response wording

[1]Note: Percentages based only on those North Dakota drivers who report that they consume alcohol

[2]Note: Percentages based only on those North Dakota drivers who report using a phone while driving

**Estimate uncertain due to limited sample size

4.2.3 Young Female Driver Group

Another driver group with noticeable differences in behaviors and attitudes is that of 18–34-year-old high-risk female (HRF) drivers. Like their high-risk male counterparts, young female drivers tend to exhibit behaviors that are more dangerous than all other drivers. Similarly, their attitudes toward safe driving habits lag behind the balance of the driver population (Table 4.8). When this female driver group was compared to all other drivers, there were statistically significant differences for several variables studied in this report.

Table 4.8 Differences in Driver Views and Behaviors, Young Female Target Group

Question	HRF (n=211)	Other Drivers (n=1,230)	Sig.[1]
Seat Belt Use	4.75	4.77	
Ticket Seat Belt	3.25	3.15	
Speed in 75 MPH Zone	2.64	2.00	##
Ticket Likely Speeding	3.66	3.34	##
Chance Arrest for DUI	4.18	3.85	##
Use Alternate Sober Driver	4.46	4.22	#
Drive After 1–2 Drinks	0.32	0.34	
Drive After 3+ Drinks	0.02	0.06	*
Ban Handheld Cell Use	3.56	3.88	
Ticket Distracted Driving	3.29	2.97	##
Use Phone While Driving	3.07	2.54	##
RSH Seat Belt	0.71	0.72	
RSH Speeding	0.60	0.62	
RSH Drunk Driving	0.74	0.78	
RSH Distracted Driving	0.65	0.68	
RSH *Vision Zero*	0.52	0.44	

[1]Note: Nominal/Ordinal scales require different tests of significance
##Significant difference at the 1% level for 1-way ANOVA
#Significant difference at the 5% level for 1-way ANOVA
*Significant difference at the 5% level for Pearson Chi-Square test

The 18–34-year-old female cohort is more likely to engage in dangerous driving behaviors. This target group has a higher likelihood of speeding in a 75-mile-per-hour zone ($F=69.526$, $df=1$, $p<0.001$) even though the group thought the chances of a ticket for speeding were greater than other drivers ($F=14.299$, $df=1$, $p<0.001$). The same pattern occurred for distracted driving: high-risk females were more likely to use a phone when driving ($F=24.858$, $df=1$, $p<0.001$) even though the group thought the chances of being ticketed for distracted driving were higher than other drivers ($F=19.350$, $df=1$, $p<0.001$).

With regard to impaired driving, this target group of 18–34-year-old females thought that the chance of being arrested for driving under the influence of alcohol was more likely than did other North Dakota drivers ($F=19.083$, $df=1$, $p<0.001$). Perhaps that is why this group was less likely to drive within two hours of consuming three or more alcoholic beverages than other North Dakotans (Chi-Sq.=6.691, $df=1$, $p=0.010$). Table 4.9 provides a complete explanation of how this group compared with the balance of the North Dakota driving population.

Table 4.9 Responses for High-Risk Female Drivers

Question		Responses, by Driver Group				
Seat Belt Use	n=1,439	Always	N. Always	Sometimes	Rarely	Never
	Other	83.1%	13.0%	2.6%	0.9%**	0.5%**
	HRF	80.6%	14.4%	4.3%**	0.6%**	0.0%**
Ticket Seat Belt	n=1,437	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	Other	13.9%	21.7%	37.9%	18.1%	8.4%
	HRF	14.0%	26.0%	36.3%	18.0%	5.8%**
Speed 75 MPH Zone	n=1,435	Always	N. Always	Sometimes	Rarely	Never
	Other	1.5%**	5.5%	16.6%	43.7%	32.6%
	HRF	3.8%**	18.8%	28.6%	34.9%	13.9%
Ticket Speeding	n=1,436	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	Other	10.4%	32.6%	43.0%	8.5%	5.5%
	HRF	15.7%	45.5%	29.8%	7.2%**	1.8%**
Chance Arrest Impaired	n=1,427	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	Other	32.1%	29.8%	30.9%	5.3%	1.8%
	HRF	45.9%	32.7%	15.2%	5.6%**	0.6%**
Alternate Driver[1]	n=926	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	Other	56.2%	26.4%	7.0%	3.9%**	6.5%
	HRF	66.9%	22.4%	5.4%**	0.0%**	5.3%**
Drive After 1–2 Drinks	n=980	None	1-5 Times	6-10 Times	11+ Times	
	Other	65.9%	30.6%	2.5%**	0.9%**	
	HRF	67.6%	31.2%	1.2%**	0.0%**	
Drive After 3+ Drinks	n=841	None	1-5 Times	6-10 Times	11+ Times	
	Other	93.8%	5.2%	0.4%**	0.6%**	
	HRF	98.1%	1.9%**	0.0%**	0.0%**	
Ban Handheld Phone	n=1,431	St. Favor	Sw. Favor	Neutral	Sw. Oppose	St. Oppose
	Other	48.4%	19.6%	11.8%	11.5%	8.7%
	HRF	27.6%	29.5%	19.5%	18.2%	5.3%**
Distracted Driving Ticket	n=1,423	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	Other	10.3%	19.0%	37.1%	24.7%	9.0%
	HRF	10.9%**	31.4%	37.1%	17.5%	3.1%**
Use Phone While Driving[2]	n=1,220	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	Other	8.5%	13.2%	31.9%	16.7%	29.6%
	HRF	8.6%**	27.2%	38.3%	14.1%**	11.8%**
RSH Seat Belt	n=1,381	Yes	No			
	Other	71.7%	28.3%			
	HRF	71.3%	28.7%			
RSH Speeding	n=1,337	Yes	No			
	Other	61.8%	38.2%			
	HRF	60.0%	40.0%			
RSH Drunk	n=1,365	Yes	No			
	Other	78.4%	21.6%			
	HRF	74.4%	25.6%			
RSH Distracted	n=1,355	Yes	No			
	Other	67.7%	32.3%			
	HRF	64.9%	35.1%			
RSH *Vision Zero*	n=1,297	Yes	No			
	Other	44.4%	55.6%			
	HRF	51.8%	48.2%			

Note: Please see Appendix A for exact question and response wording

[1]Note: Percentages based only on those North Dakota drivers who report that they consume alcohol

[2]Note: Percentages based only on those North Dakota drivers who report using a phone while driving

**Estimate uncertain due to limited sample size

4.2.4 High-Risk Driver Comparisons

The extreme views held by high-risk drivers differ when high-risk males are compared directly with high-risk females (Table 4.10). These differences are related to perceptions of traffic enforcement and dangerous behind-the-wheel behavior.

Table 4.10 Differences in Driver Views and Behaviors, High-Risk Drivers

Question	HRM (n=163)	HRF (n=211)	Sig.*1*
Seat Belt Use	4.59	4.75	#
Ticket Seat Belt	2.99	3.25	
Speed in 75 MPH Zone	2.50	2.64	
Ticket Likely Speeding	3.32	3.66	##
Chance Arrest for DUI	3.96	4.18	
Use Alternate Sober Driver	4.20	4.46	
Drive After 1–2 Drinks	0.48	0.32	*
Drive After 3+ Drinks	0.17	0.02	**
Ban Handheld Cell Use	3.25	3.56	
Ticket Distracted Driving	3.00	3.29	#
Use Phone While Driving	2.97	3.07	
RSH Seat Belt	0.75	0.71	
RSH Speeding	0.58	0.60	
RSH Drunk Driving	0.78	0.74	
RSH Distracted Driving	0.64	0.65	
RSH *Vision Zero*	0.61	0.52	

*1*Note: Nominal/Ordinal scales require different tests of significance
##Significant difference at the 1% level for 1-way ANOVA
#Significant difference at the 5% level for 1-way ANOVA
**Significant difference at the 1% level for Pearson Chi-Square test
*Significant difference at the 5% level for Pearson Chi-Square test

High-risk females generally exhibited safer practices than their male counterparts. For example, these drivers were more likely to use a seat belt ($F=5.797$, $df=1$, $p=0.017$) and drove less often within two hours of consuming one or two alcoholic beverages (Chi-Sq.=5.733, $df=1$, $p=0.017$) and within two hours of consuming three or more alcoholic beverages (Chi-Sq.=16.759, $df=1$, $p<0.001$). These same drivers also thought that traffic enforcement was effective and more likely to lead to a ticket for speeding ($F=7.275$, $df=1$, $p=0.007$) and distracted driving ($F=5.626$, $df=1$, $p=0.018$).

On average, high-risk males are more dangerous on the roadway than high-risk females (Table 4.11). A detailed explanation of how high-risk 18–34-year-old drivers compare with all other North Dakota drivers – including longitudinal trends – is presented in Appendix B. In general, when high-risk drivers are studied collectively, this group exhibits more dangerous behaviors than drivers over age 35.

Table 4.11 Responses for High-Risk Drivers

Question		**Responses, by Driver Group**				
Seat Belt Use	n=374	Always	N. Always	Sometimes	Rarely	Never
	HRF	80.6%	14.4%	4.3%**	0.6%**	0.0%**
	HRM	70.6%	20.7%	6.6%**	1.2%**	1.0%**
Ticket Seat Belt	n=374	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	HRF	14.0%	26.0%	36.3%	18.0%	5.8%**
	HRM	11.7%**	21.2%	30.9%	27.3%	9.0%**
Speed 75 MPH Zone	n=369	Always	N. Always	Sometimes	Rarely	Never
	HRF	3.8%**	18.8%	28.6%	34.9%	13.9%
	HRM	4.6%**	14.3%**	25.4%	37.8%	17.9%**
Ticket Speeding	n=373	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	HRF	15.7%	45.5%	29.8%	7.2%**	1.8%**
	HRM	10.8%**	27.2%	46.4%	14.6%**	1.0%**
Chance Arrest Impaired	n=371	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	HRF	45.9%	32.7%	15.2%	5.6%**	0.6%**
	HRM	37.5%	32.5%	19.7%**	8.6%**	1.7%**
Alternate Driver[1]	n=270	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	HRF	66.9%	22.4%	5.4%**	0.0%**	5.3%**
	HRM	51.7%	27.0%	12.8%**	6.3%**	2.2%**
Drive After 1–2 Drinks	n=279	None	1-5 Times	6-10 Times	11+ Times	
	HRF	67.6%	31.2%	1.2%**	0.0%**	
	HRM	51.7%	38.0%	5.1%**	5.2%**	
Drive After 3+ Drinks	n=261	None	1-5 Times	6-10 Times	11+ Times	
	HRF	98.1%	1.9%**	0.0%**	0.0%**	
	HRM	83.0%	14.3%**	0.4%**	2.3%**	
Ban Handheld Phone	n=372	St. Favor	Sw. Favor	Neutral	Sw. Oppose	St. Oppose
	HRF	27.6%	29.5%	19.5%	18.2%	5.3%**
	HRM	23.3%	21.8%	26.2%	14.3%**	14.4%**
Distracted Driving Ticket	n=370	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	HRF	10.9%**	31.4%	37.1%	17.5%	3.1%**
	HRM	12.6%**	21.6%	28.6%	27.5%	9.8%**
Use Phone While Driving[2]	n=359	V. Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	HRF	8.6%**	27.2%	38.3%	14.1%**	11.8%**
	HRM	8.0%**	28.1%	30.8%	19.3%	13.7%**
RSH Seat Belt	n=360	Yes	No			
	HRF	71.3%	28.7%			
	HRM	74.9%	25.1%			
RSH Speeding	n=357	Yes	No			
	HRF	60.0%	40.0%			
	HRM	58.3%	41.7%			
RSH Drunk	n=361	Yes	No			
	HRF	74.4%	25.6%			
	HRM	78.5%	21.5%			
RSH Distracted	n=357	Yes	No			
	HRF	64.9%	35.1%			
	HRM	63.7%	36.3%			
RSH *Vision Zero*	n=355	Yes	No			
	HRF	51.8%	48.2%			
	HRM	60.6%	39.4%			

Note: Please see Appendix A for exact question and response wording

[1]Note: Percentages based only on those North Dakota drivers who report that they consume alcohol

[2]Note: Percentages based only on those North Dakota drivers who report using a phone while driving

**Estimate uncertain due to limited sample size

5. CONCLUSIONS

The annual statewide driver traffic safety survey provides baseline metrics for the Highway Safety Division and others in understanding perceptions and behaviors related to focus issues. A core set of questions was selected to address nationally agreed upon priorities. These include emphases on seat belt use, impaired driving, and speeding. In addition to the core issues, questions were included to better understand views on specific programs and activities. Results show that many North Dakota drivers have adopted safe driving practices, but it is apparent that additional efforts are needed to improve safety on the state's roads.

Two specific recommendations can be made when examining trends that have taken place over the last 16 years of administering this survey. First, there is a continued dichotomy between how urban and rural residents approach the use of a seat belt while operating a vehicle. Results clearly show that rural residents are less likely to use seat belts than their urban counterparts. Improvement in this area must be made to reduce rates of fatalities and serious injuries during crash events involving rural North Dakotans. Second, there is a bifurcation in safe driving attitudes, behaviors, and beliefs factoring for whether one is a high-risk 18–34-year-old driver. Younger drivers generally engage in dangerous behavior behind the wheel more often and engage in safe practices less often than those over age 35.

Further research involving North Dakota driving tendencies can be improved. For instance, future studies involving North Dakota driving habits will be more robust when the response sample more accurately reflects the North Dakota driver population. This particular study would have been improved by having a higher percentage of 18–44-year-old drivers included in the response sample. Nonetheless, the response rate for this survey was satisfactory and most of the desired performance metrics were able to be extrapolated to represent the entire North Dakota driver population.

6. REFERENCES

Federal Highway Administration. 2025. "Highway Statistics 2023." Washington, DC: Policy and Governmental Affairs, Office of Highway Policy Information, Table DL-22. Retrieved June 9, 2025, (https://www.fhwa.dot.gov/policyinformation/statistics/2023/dl22.cfm).

Government Accounting Office. 2010. "Traffic Safety Data: State Data System Quality Varies and Limited Resources and Coordination Can Inhibit Further Progress." Washington, DC: Government Printing Office, Technical Report to Congressional Committee No. GAO-10-454.

Hedlund, J. 2008. "Traffic Safety Performance Measures for States and Federal Agencies." Washington, DC: U.S. Department of Transportation, National Highway Traffic Safety Administration, Technical Report No. DOT-HS-811-025.

Hedlund, J., T. Casanova, and N. Chaudhary. 2009. "Survey Recommendations for the NHTSA-GHSA Working Group." Trumbull, CT: Preusser Research Group, Inc., on behalf of the Governor's Highway Safety Association. Retrieved August 18, 2011, (http://www.ghsa.org/html/resources/files/pdf/planning/survey_recs.pdf).

Herbel, S., M.D. Meyer, B. Kleiner, and D. Gaines. 2009. "A Primer on Safety Performance Measures for the Transportation Planning Process." Washington, DC: U.S. Department of Transportation, Federal Highway Administration, Technical Report No. FHWA-HEP-09-043.

North Dakota Department of Transportation. 2024. "North Dakota *Vision Zero Plan:* 2024." Bismarck, ND: North Dakota Department of Transportation. Retrieved July 1, 2024, (https://visionzero.nd.gov/uploads/114/NDDOT_SHSP_withVRU_FinalWeb.pdf).

Stedman, R.C., N.A. Connelly, T.A. Heberlein, D.J. Decker, and S.B. Allred. 2019. "The End of the (Research) World As We Know It? Understanding and Coping with Declining Response Rates to Mail Surveys." *Society and Natural Resources* 32(10): 1139-1154. DOI: https://doi.org/10.1080/08941920.2019.1587127.

United States Census Bureau. 2020. American Community Survey Table DP05. ACS Demographic and Housing Estimates 2020: ACS 5-Year Estimates Data Profiles. Retrieved June 24, 2022, (https://data.census.gov/cedsci/table?t=Age%20and%20Sex&g=0400000US38%240500000&tid=ACSDP5Y2020.DP05).

United States Census Bureau. 2023. American Community Survey Table S0101. ACS Age and Sex 2023: ACS 5-Year Estimates Subject Tables. Retrieved June 25, 2025, (https://data.census.gov/table/ACSST5Y2023.S0101?t=Age+and+Sex&g=040XX00US38$0500000).

Vachal, K., A. Kubas, and J. Andersen. 2024. "North Dakota Statewide Traffic Safety Survey, 2024: Traffic Safety Performance Measures for State and Federal Agencies." Fargo, ND: Upper Great Plains Transportation Institute, North Dakota State University, DP-327: 1-54.

Vision Zero. 2024. "Seat Belt Use in North Dakota." North Dakota Department of Transportation, Bismarck, ND: 1-3. Retrieved June 9, 2025, (https://visionzero.nd.gov/uploads/0/NDDOT_PrimarySeatBeltBooklet_202425_NoBLEED.pdf).

World Health Organization. 2024. “Estimated Road Traffic Death Rate (per 100,000 Population)” [dataset]. Retrieved July 2, 2024, (https://www.who.int/data/gho/data/indicators/indicator-details/GHO/estimated-road-traffic-death-rate-(per-100-000-population).

7. APPENDIX A. SURVEY INSTRUMENT

All Responses Are Confidential

2025 North Dakota Driver Survey

SB1- How often do you use a seat belt when you drive or ride in a motor vehicle?
□ Never □ Rarely □ Sometimes □ Nearly Always □ Always

SB3- What do you think the chance is of getting a ticket if you do not wear your seat belt?
□ Very Unlikely □ Unlikely □ Somewhat Likely □ Likely □ Very Likely

SB4- Since becoming state law for all vehicle occupants to use seat belts on August 1, 2023…
□ I use it more often □ I use it less often □ No change □ Not sure

SP1- On a road with a speed limit of 75 mph, how often do you drive faster than 80 mph?
□ Never □ Rarely □ Sometimes □ Nearly Always □ Always

SP2- What do you think the chance is of getting a ticket if you drive over the speed limit?
□ Very Unlikely □ Unlikely □ Somewhat Likely □ Likely □ Very Likely

ID1- What are the chances of someone getting arrested if they drive under the influence of alcohol or drugs?
□ Very Unlikely □ Unlikely □ Somewhat Likely □ Likely □ Very Likely

ID2a- If drinking or planning to drink alcohol, how likely are you to designate an alternate driver?
□ Do Not Drink (*skip to DD1*) □ Very Unlikely □ Unlikely □ Somewhat Likely □ Likely □ Very Likely

ID2b- If you designate an alternative, which do you typically use? (select all that apply):
□ Designated sober driver in group □ Calling friend or family □ Ride share (Uber/Lyft) □ Taxi

ID3- In the past 60 days, how many times have you driven a motor vehicle within 2 hours after drinking?
1– 2 Alcoholic Drinks? □ none □ 1 – 5 times □ 6 – 10 times □ more than 10 times
3 or More Alcoholic Drinks? □ none □ 1 – 5 times □ 6 – 10 times □ more than 10 times

DD1- Do you favor or oppose a ban on hand-held phone use while driving?
□ Strongly Oppose □ Somewhat Oppose □ Do Not Favor or Oppose □ Somewhat Favor □ Strongly Favor

DD2- What do you think the chance is of getting a ticket for distracted driving?
□ Very Unlikely □ Unlikely □ Somewhat Likely □ Likely □ Very Likely

DD3- How likely are you to use a phone while driving?
□ I do not use □ Very Unlikely □ Unlikely □ Somewhat Likely □ Likely □ Very Likely
→ Purpose (select all that apply) □ Voice Calls □ Video Calls □ View/Send Text □ Email
□ Social Media □ Maps □ Video Streaming □ Other Apps
→ Is it hands-free/Bluetooth technology? □ Yes □ No

MISC1- When driving in a highway safety corridor, does it positively change your attention to driving or driver behavior?
□ Yes □ No □ Do Not Know

MISC2- Do you believe that crashes are preventable?
□ Never □ Rarely □ Sometimes □ Nearly Always □ Always

VZ1- Within the last 6 months have you read, seen, or heard traffic safety messages relating to:

Seat Belt Enforcement	□ TV	□ Radio	□ Online Ad	□ Social Media	□ Hwy Message Boards	□ None
Speed Enforcement	□ TV	□ Radio	□ Online Ad	□ Social Media	□ Hwy Message Boards	□ None
Impaired Driving Enforcement	□ TV	□ Radio	□ Online Ad	□ Social Media	□ Hwy Message Boards	□ None
Distracted Driving Enforcement	□ TV	□ Radio	□ Online Ad	□ Social Media	□ Hwy Message Boards	□ None
Vision Zero	□ TV	□ Radio	□ Online Ad	□ Social Media	□ Hwy Message Boards	□ None

DM1- Type of Vehicle You Most Often Drive: (select only one)
□ Car □ Pickup □ SUV □ Van □ Motorcycle □ Semi/Large Truck □ Other_____

DM2- Your age: □ 18 – 24 □ 25 – 34 □ 35 – 44 □ 45 – 54 □ 55 – 64 □ 65 – 74 □ 75 or Older

DM3- Your gender: □ Male □ Female

DM4- In which North Dakota county do you live? _____

Please include any traffic safety comments and suggestions for future surveys.

_____

_____

_____

Thank you for your time and participation

8. APPENDIX B. HIGH-RISK 18–34-YEAR-OLD DRIVER BEHAVIORS/PERCEPTIONS

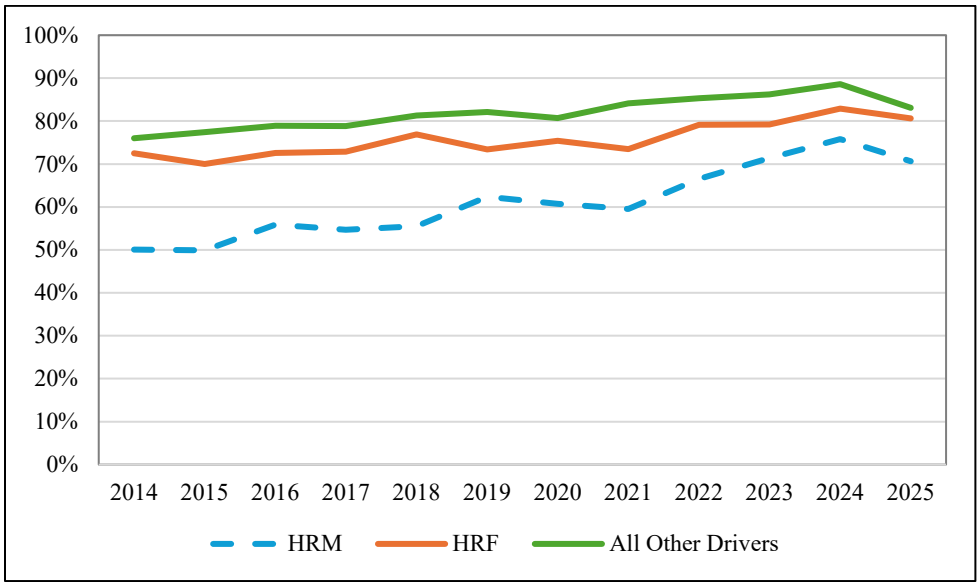

Figure B.1 Drivers Self-Reporting Seat Belt Use as Always

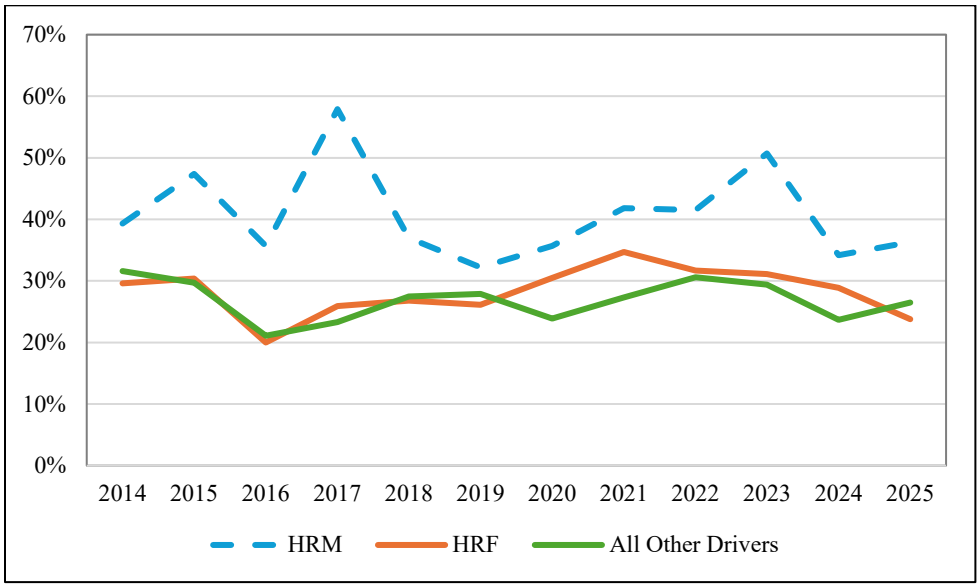

Figure B.2 Drivers Reporting the Perceived Likelihood of Receiving a Ticket for Not Wearing a Seat Belt as Very Unlikely or Unlikely

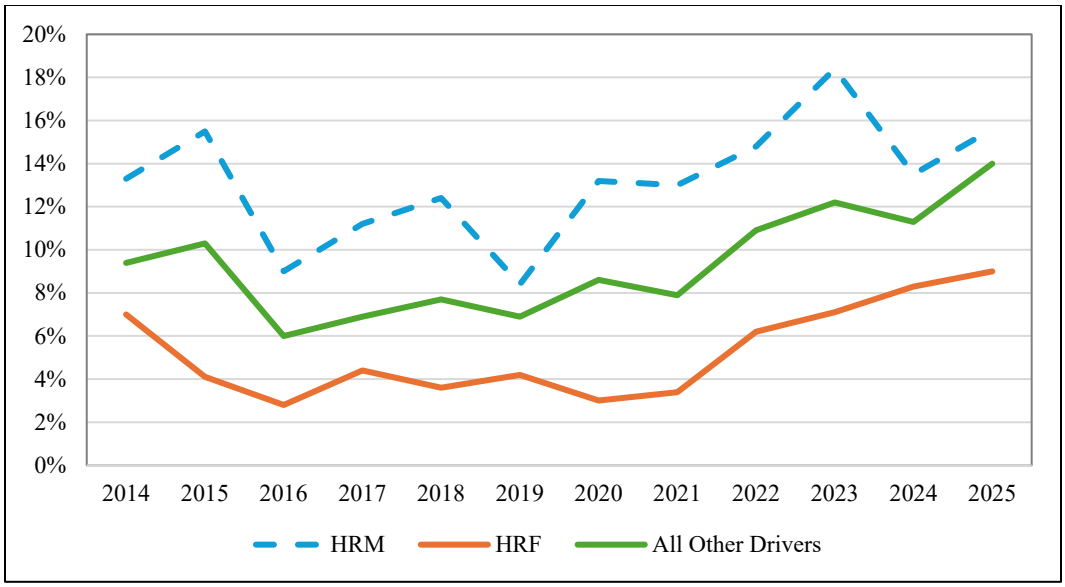

Figure B.3 Drivers Reporting the Perceived Likelihood of Receiving a Ticket for Speeding as Very Unlikely or Unlikely

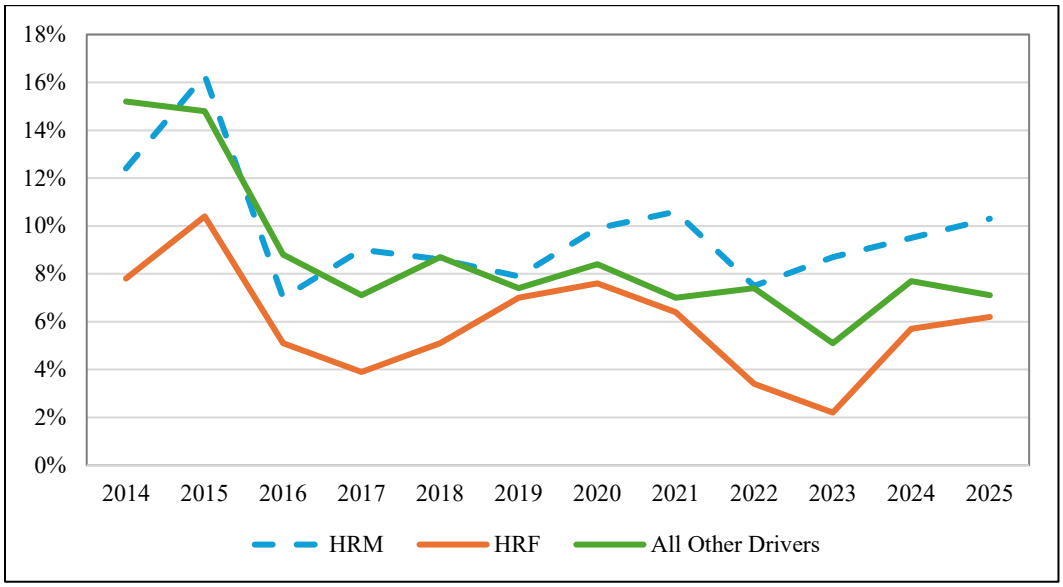

Figure B.4 Drivers Reporting the Perceived Likelihood of Being Arrested for Impaired Driving as Very Unlikely or Unlikely

Table B.1 Longitudinal Response Averages from High-Risk Male Drivers

Question	Year	Scale	HRM	Other	Sig.
Seat Belt Use	2025	1–5	4.59	4.77	
1=Never to 5=Always	2024		4.64	4.83	
	2023		4.60	4.80	**
	2022		4.56	4.79	**
	2021		4.40	4.79	**
	2020		4.41	4.73	**
	2019		4.45	4.75	**
	2018		4.31	4.75	**
	2017		4.36	4.73	**
	2016		4.33	4.71	**
	2015		4.24	4.68	**
	2014		4.26	4.65	**
	2013		4.18	4.52	**
	2012		3.98	4.41	**
	2011		4.18	4.47	**
	2010		4.04	4.43	**
2021–2025 Five-Year Average			**4.56**	**4.80**	
2020–2024 Five-Year Average			**4.52**	**4.79**	
2019–2023 Five-Year Average			**4.48**	**4.77**	
2018–2022 Five-Year Average			**4.43**	**4.76**	
2017–2021 Five-Year Average			**4.39**	**4.75**	
2016–2020 Five-Year Average			**4.37**	**4.73**	
2015–2019 Five-Year Average			**4.34**	**4.72**	
2014–2018 Five-Year Average			**4.30**	**4.70**	
2013–2017 Five-Year Average			**4.27**	**4.66**	
2012–2016 Five-Year Average			**4.20**	**4.59**	
2011–2015 Five-Year Average			**4.17**	**4.55**	
2010–2014 Five-Year Average			**4.13**	**4.50**	

Question	Year	Scale	HRM	Other	Sig.
Ticket Likely Seat Belt	2025	1–5	2.99	3.15	
1=Very Unlikely to 5=Very Likely	2024		2.93	3.29	**
	2023		2.67	3.14	**
	2022		2.88	3.05	*
	2021		2.78	3.14	*
	2020		2.85	3.18	**
	2019		2.82	3.13	**
	2018		2.94	3.17	**
	2017		2.85	3.19	**
	2016		2.99	3.26	*
	2015		2.83	3.33	**
	2014		2.98	3.23	**
	2013		2.97	3.23	**
	2012		3.06	3.20	**
	2011		2.77	3.03	**
	2010		2.74	3.12	**
2021-2025 Five–Year Average			**2.85**	**3.15**	
2020-2024 Five–Year Average			**2.82**	**3.16**	
2019-2023 Five–Year Average			**2.80**	**3.13**	
2018-2022 Five–Year Average			**2.85**	**3.13**	
2017-2021 Five–Year Average			**2.85**	**3.16**	
2016-2020 Five–Year Average			**2.89**	**3.19**	
2015-2019 Five–Year Average			**2.89**	**3.22**	
2014-2018 Five–Year Average			**2.92**	**3.24**	
2013-2017 Five–Year Average			**2.92**	**3.25**	
2012-2016 Five–Year Average			**2.97**	**3.25**	
2011-2015 Five–Year Average			**2.92**	**3.20**	
2010-2014 Five–Year Average			**2.90**	**3.16**	

Question	Year	Scale	HRM	Other	Sig.
Ticket Likely Speed	2025	1–5	3.32	3.34	
1=Very Unlikely to 5=Very Likely	2024		3.30	3.45	
	2023		3.27	3.46	
	2022		3.43	3.50	
	2021		3.50	3.58	
	2020		3.41	3.58	
	2019		3.57	3.68	
	2018		3.48	3.61	
	2017		3.53	3.66	
	2016		3.59	3.68	
	2015		3.54	3.79	*
	2014		3.47	3.75	**
	2013		3.52	3.71	**
	2012		3.64	3.71	
	2011		3.50	3.65	
	2010		3.47	3.62	**
2021-2025 Five–Year Average			**3.36**	**3.47**	
2020-2024 Five–Year Average			**3.38**	**3.51**	
2019-2023 Five–Year Average			**3.44**	**3.56**	
2018-2022 Five–Year Average			**3.48**	**3.59**	
2017-2021 Five–Year Average			**3.50**	**3.62**	
2016-2020 Five–Year Average			**3.52**	**3.64**	
2015-2019 Five–Year Average			**3.54**	**3.68**	
2014-2018 Five–Year Average			**3.52**	**3.70**	
2013-2017 Five–Year Average			**3.53**	**3.72**	
2012-2016 Five–Year Average			**3.55**	**3.73**	
2011-2015 Five–Year Average			**3.53**	**3.72**	
2010-2014 Five–Year Average			**3.52**	**3.69**	

Question	Year	Scale	HRM	Other	Sig.
Arrest for DUI 1=Very Unlikely to 5=Very Likely	2025	1–5	3.96	3.85	*
	2024		3.99	3.81	*
	2023		4.00	3.87	
	2022		3.90	3.74	*
	2021		3.84	3.80	
	2020		3.80	3.74	*
	2019		3.79	3.76	*
	2018		3.91	3.69	**
	2017		3.89	3.75	**
	2016		3.80	3.66	**
	2015		3.76	3.67	*
	2014		3.89	3.75	**
	2013		3.67	3.49	*
	2012		3.72	3.61	**
	2011		3.65	3.62	
	2010		3.61	3.52	
2021-2025 Five–Year Average			**3.94**	**3.81**	
2020-2024 Five–Year Average			**3.91**	**3.79**	
2019-2023 Five–Year Average			**3.87**	**3.78**	
2018-2022 Five–Year Average			**3.85**	**3.75**	
2017-2021 Five–Year Average			**3.85**	**3.75**	
2016-2020 Five–Year Average			**3.84**	**3.72**	
2015-2019 Five–Year Average			**3.83**	**3.71**	
2014-2018 Five–Year Average			**3.85**	**3.70**	
2013-2017 Five–Year Average			**3.80**	**3.66**	
2012-2016 Five–Year Average			**3.77**	**3.64**	
2011-2015 Five–Year Average			**3.74**	**3.63**	
2010-2014 Five–Year Average			**3.71**	**3.60**	

*Statistically significant difference at the 5% level
**Statistically significant difference at the 1% level

Table B.2 Longitudinal Response Averages from High-Risk Female Drivers

Question	Year	Scale	HRF	Other	Sig.
Seat Belt Use	2025	1–5	4.75	4.77	
1=Never to 5=Always	2024		4.76	4.83	
	2023		4.71	4.80	
	2022		4.71	4.79	
	2021		4.62	4.79	
	2020		4.69	4.73	*
	2019		4.66	4.75	
	2018		4.72	4.75	**
	2017		4.65	4.73	
	2016		4.65	4.71	
	2015		4.60	4.68	
	2014		4.67	4.65	
	2013		4.58	4.51	
2021-2025 Five–Year Average			**4.71**	**4.80**	
2020-2024 Five–Year Average			**4.70**	**4.79**	
2019-2023 Five–Year Average			**4.68**	**4.77**	
2018-2022 Five–Year Average			**4.68**	**4.76**	
2017-2021 Five–Year Average			**4.67**	**4.75**	
2016-2020 Five–Year Average			**4.67**	**4.73**	
2015-2019 Five–Year Average			**4.66**	**4.72**	
2014-2018 Five–Year Average			**4.66**	**4.70**	
2013-2017 Five–Year Average			**4.63**	**4.66**	

Question	Year	Scale	HRF	Other	Sig.
Ticket Likely Seat Belt	2025	1–5	3.25	3.15	
1=Very Unlikely to 5=Very Likely	2024		3.18	3.29	
	2023		2.99	3.14	
	2022		3.02	3.05	
	2021		2.91	3.14	
	2020		3.03	3.18	
	2019		3.18	3.13	*
	2018		3.19	3.17	
	2017		3.14	3.19	
	2016		3.33	3.26	*
	2015		3.30	3.33	
	2014		3.19	3.25	
	2013		3.15	3.25	*
2021-2025 Five–Year Average			**3.07**	**3.15**	
2020-2024 Five–Year Average			**3.03**	**3.16**	
2019-2023 Five–Year Average			**3.03**	**3.13**	
2018-2022 Five–Year Average			**3.07**	**3.13**	
2017-2021 Five–Year Average			**3.09**	**3.16**	
2016-2020 Five–Year Average			**3.17**	**3.19**	
2015-2019 Five–Year Average			**3.23**	**3.22**	
2014-2018 Five–Year Average			**3.23**	**3.24**	
2013-2017 Five–Year Average			**3.22**	**3.26**	

Question	Year	Scale	HRF	Other	Sig.
Ticket Likely Speed	2025	1–5	3.66	3.34	**
1=Very Unlikely to 5=Very Likely	2024		3.55	3.45	**
	2023		3.58	3.46	*
	2022		3.63	3.50	**
	2021		3.77	3.58	**
	2020		3.65	3.58	*
	2019		3.81	3.68	**
	2018		3.78	3.61	**
	2017		3.73	3.66	*
	2016		3.87	3.68	**
	2015		3.89	3.79	**
	2014		3.82	3.72	
	2013		3.76	3.70	
2021–2025 Five-Year Average			**3.64**	**3.47**	
2020–2024 Five-Year Average			**3.64**	**3.51**	
2019–2023 Five-Year Average			**3.69**	**3.56**	
2018–2022 Five-Year Average			**3.73**	**3.59**	
2017–2021 Five-Year Average			**3.75**	**3.62**	
2016–2020 Five-Year Average			**3.77**	**3.64**	
2015–2019 Five-Year Average			**3.82**	**3.68**	
2014–2018 Five-Year Average			**3.82**	**3.69**	
2013–2017 Five-Year Average			**3.81**	**3.71**	
Question	Year	Scale	HRF	Other	Sig.
Arrest for DUI	2025	1–5	4.18	3.85	**
1=Very Unlikely to 5=Very Likely	2024		4.05	3.81	**
	2023		4.21	3.87	**
	2022		4.15	3.74	**
	2021		3.84	3.80	**
	2020		3.99	3.74	**
	2019		3.99	3.76	**
	2018		4.04	3.69	**
	2017		4.09	3.75	**
	2016		4.06	3.66	**
	2015		3.98	3.67	**
	2014		3.95	3.65	**
	2013		3.67	3.44	*
2021–2025 Five-Year Average			**4.09**	**3.81**	
2020–2024 Five-Year Average			**4.05**	**3.79**	
2019–2023 Five-Year Average			**4.04**	**3.78**	
2018–2022 Five-Year Average			**4.00**	**3.75**	
2017–2021 Five-Year Average			**3.99**	**3.75**	
2016–2020 Five-Year Average			**4.03**	**3.72**	
2015–2019 Five-Year Average			**4.03**	**3.71**	
2014–2018 Five-Year Average			**4.02**	**3.68**	
2013–2017 Five-Year Average			**3.95**	**3.63**	

*Statistically significant difference at the 5% level
**Statistically significant difference at the 1% level

9. APPENDIX C. MISSING/REFUSE TO ANSWER RESPONSES

Q#	Question	Total Responses	Missing Responses
	Seat Belt		
SB1	Seat Belt Use	1,641	2
SB3	Chance Ticket Seat Belt	1,639	4
SB4	Primary Seat Belt Law	1,624	19
	Speeding		
SP1	Speed 75 MPH Zone	1,632	11
SP2	Chance Ticket Speeding	1,637	6
	Alcohol/Impairment		
ID1	Chance Arrest Drinking	1,629	14
ID2a	Alternate Driver	1,626	17
ID2b	Alternate Driver Type	1,101	542
ID3a	Drive 1–2 Drinks	1,131	512
ID3b	Drive 3+ Drinks	978	665
	Distracted Driving		
DD1	Handheld Ban	1,631	12
DD2	Chance Ticket Distracted	1,620	23
DD3	Use Phone While Driving	1,598	45
DD3a	Use Phone Purpose	1,643	0
DD3b	Use Phone Hands-Free	1,248	395
	Awareness/Exposure		
MISC1	Highway Safety Corridor	1,596	47
MISC2	Crashes Preventable	1,629	14
VZ1a	RSH Seat Belt	1,568	75
VZ1b	RSH Speeding	1,521	122
VZ1c	RSH Drunk Driving	1,555	88
VZ1d	RSH Distracted Driving	1,540	103
VZ1e	RSH *Vision Zero*	1,480	163

Total n=1,643

10. APPENDIX D. DRIVER RESPONSES BY REGION AND GEOGRAPHY

Question	Region or Geography, Response					
What are the chances of getting a ticket if you…	Don't wear your seat belt		Drive over the speed limit		Drive after drinking alcohol	
	EAST	WEST	EAST	WEST	EAST	WEST
V. Likely	15.6%	11.3%	12.1%	12.7%	39.2%	34.6%
Likely	23.2%	23.3%	35.7%	39.4%	26.5%	37.6%
Sw. Likely	35.9%	38.8%	39.2%	37.0%	26.9%	21.7%
Unlikely	17.4%	19.8%	8.5%	7.8%	6.3%	4.5%**
V. Unlikely	7.8%	6.8%	4.6%**	3.0%	1.2%**	1.7%**
What are the chances of getting a ticket if you…	Don't wear your seat belt		Drive over the speed limit		Drive after drinking alcohol	
	URBAN	RURAL	URBAN	RURAL	URBAN	RURAL
V. Likely	13.1%	16.4%	11.3%	15.9%	36.8%	39.2%
Sw. Likely	21.9%	27.9%	37.3%	36.9%	30.9%	31.1%
Likely	38.5%	32.1%	39.2%	35.3%	25.9%	20.8%
Unlikely	19.1%	15.8%	8.2%	8.3%	5.4%	6.0%
V. Unlikely	7.3%	7.8%	4.1%	3.6%	0.9%**	3.0%**
Times driving after drinking 1–2 drinks in the past 60 days…			None	1–5 Times	6–10 Times	10+ Times
East			66.6%	30.3%	2.6%**	0.5%**
West			65.1%	32.3%	1.4%**	1.2%**
Urban			66.1%	30.9%	2.3%**	0.7%**
Rural			65.8%	31.7%	1.7%**	0.8%**
Times driving after drinking 3+ drinks in the past 60 days…			None	1–5 Times	6–10 Times	10+ Times
East			94.3%	5.3%	0.0%**	0.4%**
West			96.2%	2.8%**	0.6%**	0.4%**
Urban			95.4%	3.9%	0.3%**	0.3%**
Rural			94.0%	5.3%	0.1%**	0.7%**
Seat Belt Use		Always	N. Always	Sometimes	Rarely	Never
East		82.5%	13.2%	3.3%	0.8%**	0.2%**
West		80.6%	14.6%	3.5%	0.8%**	0.5%**
Urban		86.5%	10.7%	2.1%**	0.5%**	0.2%**
Rural		65.6%	24.4%	7.7%	1.6%**	0.7%**
**Fewer than 30 responses in this group						

11. APPENDIX E. EXPOSURE TO TRAFFIC SAFETY MESSAGES

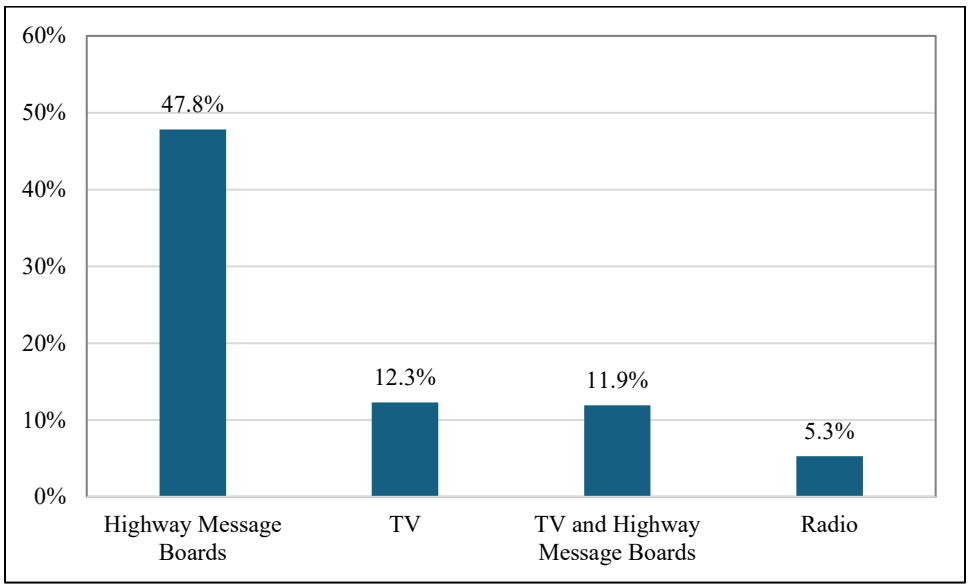

Figure E.1 Exposure to Messages about Seat Belts, by Source

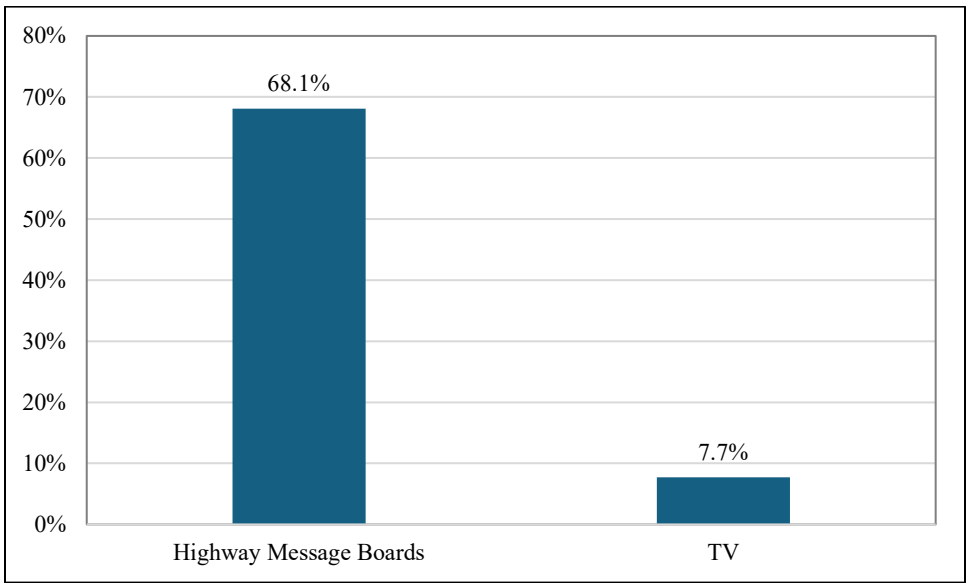

Figure E.2 Exposure to Messages about Speeding, by Source

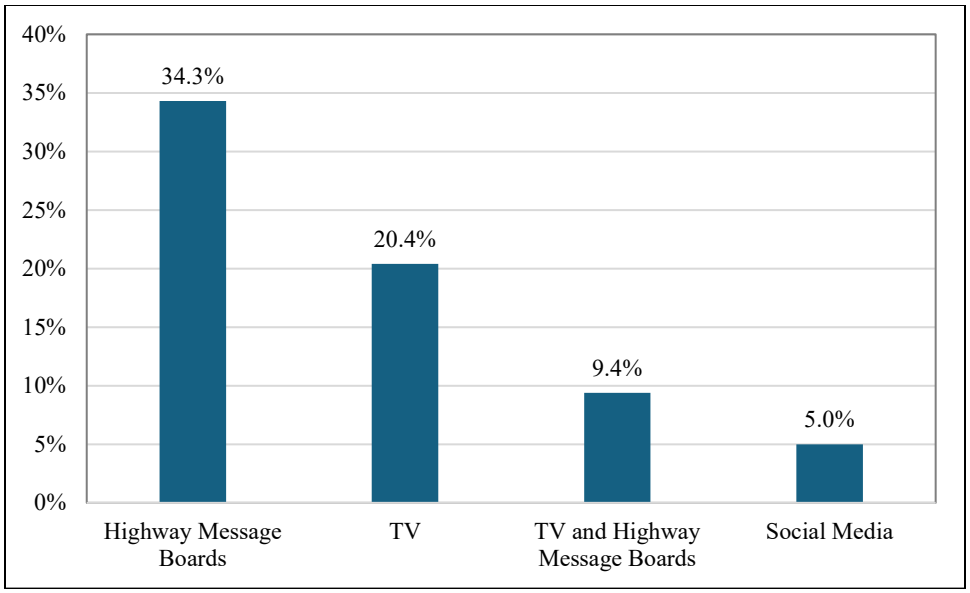

Figure E.3 Exposure to Messages about Drunk Driving, by Source

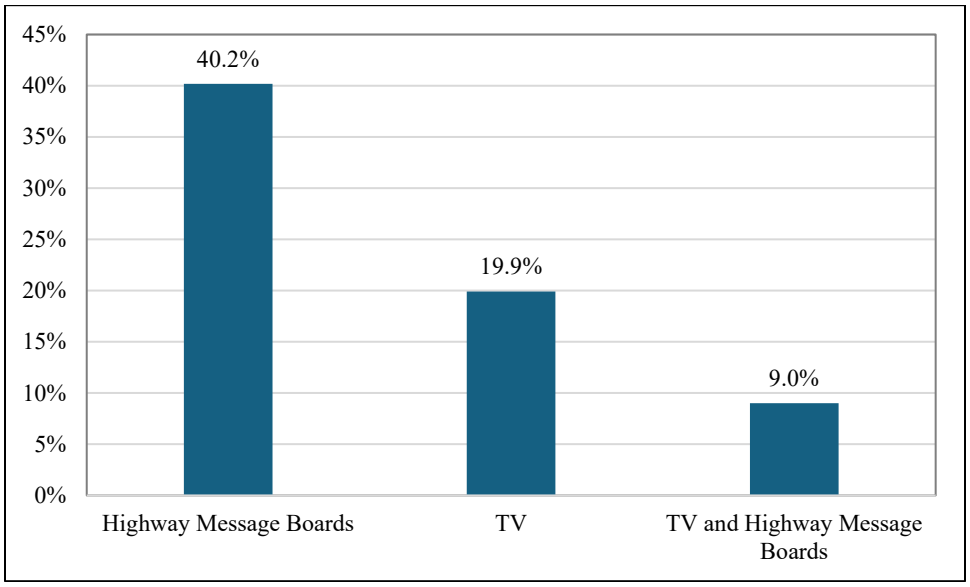

Figure E.4 Exposure to Messages about Distracted Driving, by Source

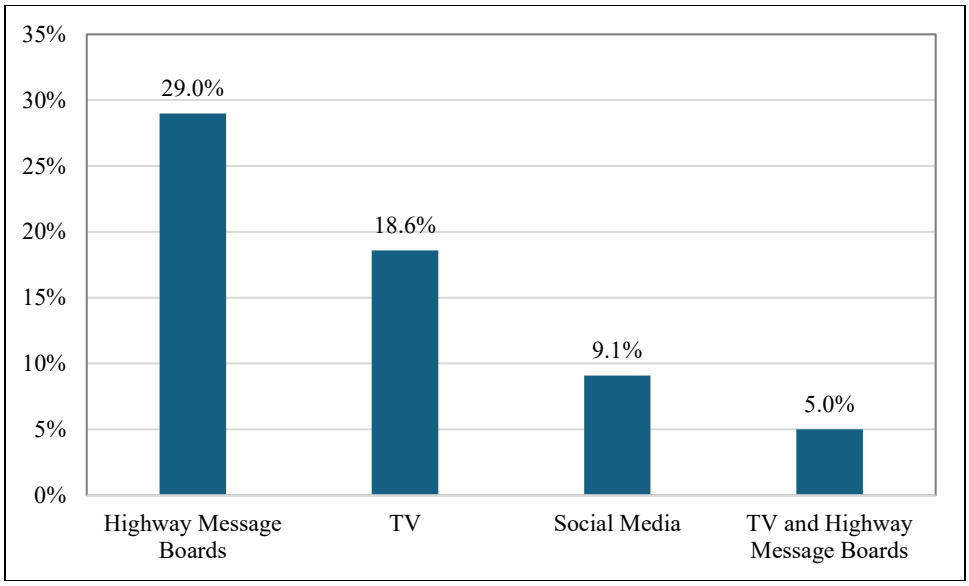

Figure E.5 Exposure to Messages about *Vision Zero*, by Source

12. APPENDIX F. DRIVER RESPONSES BY VEHICLE TYPE

Table F.1 Seat Belt Use, by Vehicle Type

Vehicle Type	Never or Rarely	Sometimes	Nearly Always or Always
Car	0.9%**	1.9%**	97.3%
Pickup	2.9%**	8.9%	88.2%
SUV	0.6%**	2.7%**	96.6%
Van	0.8%**	1.0%**	98.2%

**Fewer than 30 responses in this group

Table F.2 Times Driving After Consuming 1-to-2 Alcoholic Beverages, by Vehicle Type

Vehicle Type	None	1-5 Times	6-10 Times	10+ Times
Car	71.7%	27.1%	0.9%**	0.4%**
Pickup	54.6%	38.3%	4.7%**	2.4%**
SUV	65.8%	31.6%	2.2%**	0.5%**
Van	64.4%**	34.5%**	1.2%**	0.0%**

**Fewer than 30 responses in this group

Table F.3 Times Driving After Consuming 3-Plus Alcoholic Beverages, by Vehicle Type

Vehicle Type	None	1-5 Times	6-10 Times	10+ Times
Car	94.7%	4.9%**	0.0%**	0.4%**
Pickup	88.9%	9.2%	0.8%**	1.1%**
SUV	97.0%	2.6%**	0.2%**	0.2%**
Van	97.6%**	2.4%**	0.0%**	0.0%**

**Fewer than 30 responses in this group

13. APPENDIX G. COUNTY-LEVEL RESPONSES

Table G.1 Seat Belt Use

County*	Never	Rarely	Sometimes	Nearly Always	Always
Barnes	7.3%	0.0%	24.6%	13.7%	54.5%
Burleigh	0.5%	0.3%	3.7%	11.8%	83.7%
Cass	0.0%	0.7%	0.4%	8.0%	90.8%
Grand Forks	0.0%	0.0%	4.1%	11.0%	84.9%
Morton	0.0%	1.2%	5.2%	11.6%	81.9%
Ramsey	0.0%	0.0%	1.3%	32.0%	66.6%
Richland	1.2%	0.0%	0.0%	14.2%	84.6%
Stark	0.0%	2.7%	2.4%	27.6%	67.4%
Stutsman	0.9%	9.1%	2.2%	20.8%	67.0%
Traill	0.0%	1.6%	1.6%	13.5%	83.3%
Walsh	0.0%	0.0%	5.2%	16.9%	77.9%
Ward	0.6%	0.6%	0.0%	17.2%	81.5%
Williams	0.0%	0.0%	1.7%	12.2%	86.2%

*Only counties with 30 or more responses are included

Table G.2 Chances Ticket No Seat Belt

County*	Very Unlikely	Unlikely	Somewhat Likely	Likely	Very Likely
Barnes	4.7%	9.2%	44.8%	25.1%	16.1%
Burleigh	6.9%	25.2%	32.9%	23.8%	11.1%
Cass	8.1%	19.7%	40.1%	16.9%	15.2%
Grand Forks	7.2%	15.6%	30.9%	33.2%	13.2%
Morton	2.9%	6.9%	61.9%	22.5%	5.8%
Ramsey	2.7%	6.5%	40.8%	21.3%	28.7%
Richland	4.3%	11.3%	41.8%	34.8%	7.8%
Stark	1.9%	10.4%	39.5%	35.4%	12.8%
Stutsman	13.6%	12.7%	20.0%	43.3%	10.4%
Traill	7.5%	26.5%	28.9%	31.0%	6.1%
Walsh	4.2%	25.6%	32.6%	32.3%	5.3%
Ward	8.9%	17.1%	39.1%	20.2%	14.9%
Williams	18.9%	24.5%	28.5%	22.1%	5.9%

*Only counties with 30 or more responses are included

Table G.3 Ticket Likelihood for Speeding

County*	Very Unlikely	Unlikely	Somewhat Likely	Likely	Very Likely
Barnes	0.0%	2.4%	32.1%	55.1%	10.4%
Burleigh	2.4%	8.2%	37.4%	37.4%	14.6%
Cass	5.3%	10.7%	38.5%	34.6%	10.8%
Grand Forks	4.6%	3.2%	45.9%	37.9%	8.3%
Morton	1.3%	7.1%	38.4%	41.6%	11.6%
Ramsey	0.0%	0.0%	34.9%	41.9%	23.2%
Richland	6.2%	8.0%	36.7%	35.1%	14.0%
Stark	1.9%	11.7%	39.8%	29.2%	17.4%
Stutsman	1.3%	10.0%	45.7%	26.6%	16.5%
Traill	4.2%	25.5%	32.3%	33.2%	4.8%
Walsh	0.0%	3.4%	45.8%	32.3%	18.4%
Ward	3.9%	6.5%	36.5%	43.3%	9.8%
Williams	13.0%	7.3%	34.5%	41.4%	3.8%

*Only counties with 30 or more responses are included

Table G.4 Chances of Arrest for Driving Under Influence of Alcohol/Drugs

County*	Very Unlikely	Unlikely	Somewhat Likely	Likely	Very Likely
Barnes	2.0%	0.0%	9.2%	34.2%	54.6%
Burleigh	0.9%	3.7%	28.3%	35.5%	31.6%
Cass	0.6%	7.4%	29.8%	24.5%	37.7%
Grand Forks	0.6%	1.7%	26.9%	28.2%	42.5%
Morton	0.5%	4.8%	9.7%	61.2%	23.8%
Ramsey	0.0%	4.0%	5.3%	43.3%	47.4%
Richland	0.0%	1.2%	18.1%	31.9%	48.8%
Stark	3.7%	4.1%	16.9%	36.7%	38.5%
Stutsman	2.9%	10.5%	24.4%	18.6%	43.6%
Traill	1.9%	3.7%	44.4%	16.1%	34.0%
Walsh	3.8%	11.9%	15.0%	34.7%	34.7%
Ward	2.7%	7.1%	16.3%	27.7%	46.2%
Williams	7.9%	1.8%	13.8%	46.9%	29.6%

*Only counties with 30 or more responses are included

Table G.5 Likelihood of Getting Ticketed for Distracted Driving

County*	Very Unlikely	Unlikely	Somewhat Likely	Likely	Very Likely
Barnes	25.6%	9.0%	40.8%	20.3%	4.3%
Burleigh	5.3%	26.1%	33.1%	28.4%	7.1%
Cass	7.1%	25.5%	32.5%	21.3%	13.6%
Grand Forks	11.0%	13.1%	50.0%	17.5%	8.3%
Morton	1.8%	17.7%	50.7%	19.9%	9.9%
Richland	1.3%	7.7%	33.5%	46.7%	10.7%
Stark	3.1%	14.2%	33.1%	36.8%	12.8%
Stutsman	5.6%	19.9%	39.3%	26.7%	8.5%
Traill	6.9%	17.9%	31.4%	19.6%	24.2%
Walsh	6.0%	22.6%	41.1%	24.0%	6.3%
Ward	7.7%	19.8%	29.7%	35.7%	7.1%
Williams	4.4%	19.9%	47.1%	22.2%	6.3%

*Only counties with 30 or more responses are included

14. APPENDIX H. CORE QUESTION RESPONSES

Table H.1 Core Question Responses

Core	Survey Question	Responses			
ID-3a	In the past 60 days, how many times have you driven a vehicle within two hours after drinking 1-2 drinks?				
		None	1–5 Times	6–10 Times	More than 10 Times
	2025[#]	66.0%	31.1%	2.1%	0.8%*
	2024[#]	60.0%	37.2%	2.3%	0.5%*
	2023[#]	57.1%	39.3%	3.1%	0.5%*
	2022[#]	69.5%	27.5%	2.3%	0.7%*
	2021[#]	71.3%	26.5%	1.5%*	0.6%*
	2020[#]	67.4%	30.3%	1.3%	1.0%*
	2019[#]	64.8%	32.1%	2.2%	0.9%
	2018[#]	65.5%	30.6%	2.4%	1.6%
	2017[#]	68.5%	29.1%	1.6%	0.7%*
	2016[#]	71.0%	26.5%	2.0%	0.4%*
	2015[#]	66.7%	30.1%	1.5%	0.7%*
	2014[#]	71.3%	27.0%	1.3%	0.4%*
	2013[#]	69.5%	26.8%	3.0%	0.7%*
2021–2025 Five-Year Avg.		**64.8%**	**32.3%**	**2.3%**	**0.6%**
2020–2024 Five-Year Avg.		**65.1%**	**32.2%**	**2.1%**	**0.7%**
2019–2023 Five-Year Avg.		**66.0%**	**31.1%**	**2.1%**	**0.7%**
2018–2022 Five-Year Avg.		**67.7%**	**29.4%**	**1.9%**	**1.0%**
2017–2021 Five-Year Avg.		**67.5%**	**29.7%**	**1.8%**	**1.0%**
2016–2020 Five-Year Avg.		**67.4%**	**29.7%**	**1.9%**	**0.9%**
2015–2019 Five-Year Avg.		**67.3%**	**29.7%**	**1.9%**	**0.9%**
2014–2018 Five-Year Avg.		**68.6%**	**28.7%**	**1.8%**	**0.8%**
2013–2017 Five-Year Avg.		**69.4%**	**27.9%**	**1.9%**	**0.6%**

Table H.1 Core Question Responses (Continued)

Core	Survey Question	Responses			
ID-3b	In the past 60 days, how many times have you driven a vehicle within two hours after drinking 3+ drinks?				
		None	1–5 Times	6–10 Times	More than 10 Times
	2025#	95.1%	4.3%	0.2%*	0.4%*
	2024#	93.9%	5.1%	0.6%*	0.4%*
	2023#	93.5%	5.8%	0.2%*	0.5%*
	2022#	95.1%	4.1%	0.7%*	0.1%*
	2021#	95.5%	4.1%	0.2%*	0.1%*
	2020#	93.5%	6.1%	0.3%*	0.1%*
	2019#	93.0%	6.4%	0.4%*	0.1%*
	2018#	92.6%	6.5%	0.7%*	0.2%*
	2017#	93.0%	6.7%	0.3%*	0.1%*
	2016#	95.3%	4.4%	0.1%*	0.2%*
	2015#	93.4%	6.1%	0.5%*	0.1%*
	2014#	94.5%	5.1%	0.2%*	0.2%*
	2013#	92.4%	6.6%	0.8%*	0.2%*
2021–2025 Five-Year Avg.		**94.6%**	**4.7%**	**0.4%**	**0.3%**
2020–2024 Five-Year Avg.		**94.3%**	**5.0%**	**0.4%**	**0.2%**
2019–2023 Five-Year Avg.		**94.1%**	**5.3%**	**0.4%**	**0.2%**
2018–2022 Five-Year Avg.		**93.9%**	**5.4%**	**0.5%**	**0.1%**
2017–2021 Five-Year Avg.		**93.5%**	**6.0%**	**0.4%**	**0.1%**
2016–2020 Five-Year Avg.		**93.5%**	**6.0%**	**0.4%**	**0.1%**
2015–2019 Five-Year Avg.		**93.5%**	**6.0%**	**0.4%**	**0.1%**
2014–2018 Five-Year Avg.		**93.8%**	**5.8%**	**0.4%**	**0.2%**
2013–2017 Five-Year Avg		**93.7%**	**5.8%**	**0.4%**	**0.2%**

Table H.1 Core Question Responses (Continued)

Core	Survey Question	Responses				
ID-1	What are the chances of someone getting arrested if they drive under the influence of alcohol or drugs?					
		Very Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	2025	37.3%	31.0%	24.8%	5.5%	1.4%
	2024	34.1%	31.1%	27.9%	6.2%	0.6%*
	2023	37.9%	32.8%	25.4%	2.2%	1.7%
	2022	34.8%	29.8%	29.9%	4.8%	0.8%*
	2021	27.3%	35.1%	30.8%	6.0%	0.8%*
	2020	32.6%	31.2%	28.1%	6.7%	1.4%
	2019	32.0%	33.2%	27.6%	5.6%	1.6%
	2018	31.9%	33.7%	27.6%	5.2%	1.5%*
	2017	32.5%	35.9%	26.3%	4.4%	1.0%
	2016	32.9%	31.4%	29.0%	5.4%	1.2%
	2015	33.6%	21.3%	32.9%	10.3%	2.1%
	2014	29.7%	25.9%	31.6%	11.1%	1.7%
	2013	25.9%	26.5%	29.1%	16.7%	1.8%
	2012	32.5%	25.9%	29.7%	10.3%	1.6%
	2011	31.3%	26.7%	26.7%	12.6%	2.7%
	2010	25.0%	31.0%	26.0%	15.0%	4.0%
2020–2025 Five-Year Avg.		**34.3%**	**32.0%**	**27.8%**	**4.9%**	**1.1%**
2020–2024 Five-Year Avg.		**33.3%**	**32.0%**	**28.4%**	**5.2%**	**1.1%**
2019–2023 Five-Year Avg.		**32.9%**	**32.4%**	**28.4%**	**5.1%**	**1.3%**
2018–2022 Five-Year Avg.		**31.7%**	**32.6%**	**28.8%**	**5.7%**	**1.2%**
2017–2021 Five-Year Avg.		**31.3%**	**33.8%**	**28.1%**	**5.6%**	**1.3%**
2016–2020 Five-Year Avg.		**32.4%**	**33.1%**	**27.7%**	**5.5%**	**1.3%**
2015–2019 Five-Year Avg.		**32.6%**	**31.1%**	**28.7%**	**6.2%**	**1.5%**
2014–2018 Five-Year Avg.		**32.1%**	**29.6%**	**29.5%**	**7.3%**	**1.5%**
2013–2017 Five-Year Avg.		**30.9%**	**26.3%**	**31.7%**	**9.6%**	**1.6%**
2012–2016 Five-Year Avg.		**30.9%**	**26.2%**	**30.5%**	**10.8%**	**1.7%**
2011–2016 Five-Year Avg.		**30.6%**	**25.3%**	**30.0%**	**12.2%**	**2.0%**
2010–2014 Five-Year Avg.		**28.9%**	**27.2%**	**22.7%**	**13.1%**	**2.4%**

Table H.1 Core Question Responses (Continued)

Core	Survey Question	Responses				
SB-1	How often do you use seat belts when you drive or ride in a vehicle?					
		Always	N. Always	Sometimes	Rarely	Never
	2025	81.8%	13.8%	3.4%	0.8%*	0.3%*
	2024	85.8%	9.8%	3.1%	0.9%*	0.5%*
	2023	82.6%	12.2%	4.1%	0.7%*	0.5%*
	2022	81.8%	13.1%	3.5%	1.1%*	0.5%*
	2021	77.9%	16.1%	4.1%	1.5%*	0.4%*
	2020	77.1%	17.1%	4.1%	1.4%	0.3%*
	2019	76.6%	17.4%	4.5%	0.8%*	0.6%*
	2018	77.8%	17.3%	3.9%	0.5%*	0.4%*
	2017	74.4%	19.5%	4.6%	1.2%*	0.3%*
	2016	74.2%	19.7%	4.1%	1.6%	0.4%*
	2015	71.9%	20.4%	5.6%	1.6%	0.6%*
	2014	72.2%	19.7%	5.6%	2.1%	0.5%*
	2013	70.5%	21.3%	6.0%	1.8%	0.4%*
	2012	62.8%	26.9%	6.5%	2.9%	0.9%
	2011	67.9%	23.5%	5.3%	2.7%	0.6%*
	2010	58.0%	27.0%	10.0%	3.0%	1.0%
2021–2025 Five-Year Avg.		**82.0%**	**13.0%**	**3.6%**	**1.0%**	**0.4%**
2020–2024 Five-Year Avg.		**81.0%**	**13.7%**	**3.8%**	**1.1%**	**0.4%**
2019–2023 Five-Year Avg.		**79.2%**	**15.2%**	**4.1%**	**1.1%**	**0.5%**
2018–2022 Five-Year Avg.		**78.2%**	**16.2%**	**4.0%**	**1.1%**	**0.4%**
2017–2021 Five-Year Avg.		**76.8%**	**17.5%**	**4.2%**	**1.1%**	**0.4%**
2016–2020 Five-Year Avg.		**76.0%**	**18.2%**	**4.2%**	**1.1%**	**0.4%**
2015–2019 Five-Year Avg.		**75.0%**	**18.9%**	**4.5%**	**1.1%**	**0.5%**
2014–2018 Five-Year Avg.		**74.1%**	**19.3%**	**4.8%**	**1.4%**	**0.4%**
2013–2017 Five-Year Avg.		**72.6%**	**20.1%**	**5.2%**	**1.7%**	**0.4%**
2012–2016 Five-Year Avg.		**70.3%**	**21.6%**	**5.6%**	**2.0%**	**0.6%**
2011–2016 Five-Year Avg.		**69.1%**	**22.4%**	**5.8%**	**2.2%**	**0.6%**
2010–2014 Five-Year Avg.		**66.3%**	**23.7%**	**6.7%**	**2.5%**	**0.7%**

Table H.1 Core Question Responses (Continued)

Core	Survey Question	Responses				
SB-3	What do you think the chance is of getting a ticket if you do not wear your seat belt?					
		Very Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	2025	13.9%	23.2%	37.1%	18.3%	7.4%
	2024	15.1%	23.4%	35.3%	22.0%	4.2%
	2023	10.3%	23.1%	35.7%	23.4%	7.4%
	2022	10.3%	21.7%	36.5%	23.8%	7.6%
	2021	9.7%	19.4%	39.3%	25.4%	6.2%
	2020	10.2%	23.0%	39.0%	21.0%	6.7%
	2019	11.9%	22.7%	38.0%	23.0%	4.5%
	2018	13.9%	22.0%	36.7%	22.4%	5.1%
	2017	11.4%	23.6%	39.5%	19.2%	6.3%
	2016	15.1%	24.5%	39.2%	16.7%	4.5%
	2015	16.9%	21.6%	30.6%	26.5%	4.4%
	2014	16.5%	26.8%	24.9%	26.3%	5.6%
	2013	15.5%	21.8%	28.8%	31.3%	2.7%
	2012	17.1%	26.6%	28.1%	23.7%	4.5%
	2011	16.0%	25.3%	22.6%	25.0%	11.2%
	2010	14.0%	23.0%	26.0%	26.0%	10.0%
2021–2025 Five-Year Avg.		**11.9%**	**22.2%**	**36.8%**	**22.6%**	**6.6%**
2020-2024 Five-Year Avg.		**11.1%**	**22.1%**	**37.2%**	**23.1%**	**6.4%**
2019-2023 Five-Year Avg.		**10.5%**	**22.0%**	**37.7%**	**23.3%**	**6.5%**
2018-2022 Five-Year Avg.		**11.2%**	**21.8%**	**37.9%**	**23.1%**	**6.0%**
2017-2021 Five-Year Avg.		**11.4%**	**22.1%**	**38.5%**	**22.2%**	**5.8%**
2016-2020 Five-Year Avg.		**12.5%**	**23.2%**	**38.5%**	**20.5%**	**5.4%**
2015-2019 Five-Year Avg.		**13.8%**	**22.9%**	**36.8%**	**21.6%**	**5.0%**
2014-2018 Five-Year Avg.		**14.8%**	**34.2%**	**23.7%**	**22.2%**	**5.2%**
2013-2017 Five-Year Avg.		**15.1%**	**29.4%**	**26.8%**	**24.0%**	**4.7%**
2012-2016 Five-Year Avg.		**16.2%**	**30.3%**	**24.3%**	**24.9%**	**4.3%**
2011-2016 Five-Year Avg.		**16.4%**	**27.0%**	**24.4%**	**26.6%**	**5.7%**
2010-2014 Five-Year Avg.		**15.8%**	**26.1%**	**24.7%**	**26.5%**	**6.8%**

Table H.1 Core Question Responses (Continued)

Core	Survey Question	Responses				
SP-2	What do you think the chance is of getting a ticket if you drive over the speed limit?					
		Very Likely	Likely	Sw. Likely	Unlikely	V. Unlikely
	2025	12.3%	37.2%	38.3%	8.2%	4.0%
	2024	14.0%	32.1%	43.8%	8.8%	1.3%*
	2023	12.8%	37.0%	40.1%	8.3%	1.8%
	2022	14.3%	37.5%	39.3%	7.4%	1.5%
	2021	14.7%	45.6%	33.9%	4.1%	1.7%*
	2020	14.0%	39.9%	40.1%	4.7%	1.2%*
	2019	19.1%	42.8%	32.6%	4.7%	0.8%*
	2018	17.8%	40.7%	35.8%	4.5%	1.2%*
	2017	15.4%	45.3%	33.5%	4.4%	1.3%
	2016	20.5%	42.4%	32.8%	3.8%	0.5%*
	2015	24.0%	25.7%	43.3%	6.5%	0.5%*
	2014	23.9%	32.7%	34.3%	8.1%	1.0%*
	2013	24.0%	29.3%	37.5%	8.4%	0.9%*
	2012	28.7%	28.8%	33.6%	7.4%	1.5%*
	2011	28.0%	29.1%	31.3%	9.5%	2.1%
	2010	26.0%	28.0%	30.0%	12.0%	4.0%
2021–2025 Five-Year Avg.		**13.6%**	**37.9%**	**39.1%**	**7.4%**	**2.1%**
2020-2024 Five-Year Avg.		**14.0%**	**38.4%**	**39.4%**	**6.7%**	**1.5%**
2019-2023 Five-Year Avg.		**15.0%**	**40.6%**	**37.2%**	**5.8%**	**1.4%**
2018-2022 Five-Year Avg.		**16.0%**	**41.3%**	**36.3%**	**5.1%**	**1.3%**
2017-2021 Five-Year Avg.		**16.2%**	**42.9%**	**35.2%**	**4.5%**	**1.2%**
2016-2020 Five-Year Avg.		**17.4%**	**42.2%**	**35.0%**	**4.4%**	**1.0%**
2015-2019 Five-Year Avg.		**19.3%**	**39.4%**	**35.6%**	**4.8%**	**0.9%**
2014-2018 Five-Year Avg.		**20.3%**	**35.9%**	**37.4%**	**5.5%**	**0.9%**
2013-2017 Five-Year Avg.		**21.6%**	**38.6%**	**32.7%**	**6.2%**	**0.8%**
2012-2016 Five-Year Avg.		**24.2%**	**36.3%**	**31.8%**	**6.8%**	**0.9%**
2011-2016 Five-Year Avg.		**25.7%**	**36.0%**	**29.1%**	**8.0%**	**1.2%**
2010-2014 Five-Year Avg.		**26.1%**	**33.3%**	**29.6%**	**9.1%**	**1.9%**

*Estimate uncertain due to limited sample size
#Due to wording changes in ID-3a and ID-3b, trends from 2010-2012 could not be studied