# Evaluation of Community Traffic Safety Programs and Motorcycle Operator Training Programs

Final Report

April 1997

JHR 97-255 Project JH 95-4

Christian F. Davis
Professor of Civil and Environmental Engineering
Director of the Connecticut Transportation Institute

This research was sponsored by the Joint Highway Research Advisory Council (JHRAC) of the University of Connecticut and the Connecticut Department of Transportation.

**Technical Report Documentation Page**

| 1. Report No. | 2. Government Accession No. | 3. Recipient's Catalog No. |
|---|---|---|
| JHR 97-255 | | |

| 4. Title and Subtitle | 5. Report Date |
|---|---|
| Evaluation of Community Traffic Safety Programs and Motorcycle Operator Training Programs | April, 1997 |
| | 6. Performing Organization Code |
| 7. Author(s) | 8. Performing Organization Report No. JHR 97-255 |
| 9. Performing Organization Name and Address<br>University of Connecticut<br>Department of Civil and Environmental Engineering<br>191 Auditorium Road, Box U-37<br>Storrs, CT 06269 | 10 Work Unit No. (TRAIS)<br>11. Contract or Grant No. |
| 12. Sponsoring Agency Name and Address<br>Connecticut Department of Transportation<br>280 West Street<br>Rocky Hill, CT 06067-0207 | 13. Type of Report and Period Covered<br>Final Report<br>14. Sponsoring Agency Code |

15 Supplementary Notes

16. Abstract

This report presents an analysis of two programs administered by the Connecticut Department of Transportation, Office of Highway Safety. The programs are four Community Traffic Safety Programs (CTSPs) and the Connecticut Rider Education Program (CONREP). The analyses are based on (1) a telephone survey of a randomly selected sample of 1000 persons from the general, non-institutionalized population, 18 years of age and older, (2) an analysis of motorcycle accident records for 1994, and (3) a telephone survey of a randomly selected sample of 100 CONREP graduates. The results show that a very small percentage of the population is aware of the existence of CTSPs, but those who have had dealings with one are overwhelmingly positive in their evaluations. While the educational materials were judged to be worthwhile, formal training in bicycle operation was not seen to be very effective. on the basis of accident records, CONREP graduates appear to be much safer operators than non-graduates. CONREP is perceived as quite valuable and they were nearly unanimous in their praise.

| 17. Key Words | 18. Distribution Statement |
|---|---|
| Highway Safety, Motorcycle Training, Community Traffic Safety | No Restrictions |

| 19. Security Classif. (of this report) | 20. Security Classif. (of this page) | 21. No. of Pages | 22. Price |
|---|---|---|---|
| Unclassified | Unclassified | 63 | |

**Form DOT F 1700.7** (8-72) Reproduction of completed page authorized

## ACKNOWLEDGEMENTS

The author acknowledges, with thanks, the considerable assistance given by Mr. Raymond Gaulin of the Office of Highway Safety for assisting in coordinating the project and Mr. Graig Mandell of the Bureau of Policy and Planning for providing the accident records.

# SI* (MODERN METRIC) CONVERSION FACTORS

## APPROXIMATE CONVERSIONS TO SI UNITS

| Symbol | When You Know | Multiply By | To Find | Symbol |
|---|---|---|---|---|
| | | **LENGTH** | | |
| in | inches | 25.4 | millimetres | mm |
| ft | feet | 0.305 | metres | m |
| yd | yards | 0.914 | metres | m |
| mi | miles | 1.61 | kilometres | km |
| | | **AREA** | | |
| $in^2$ | square inches | 645.2 | millimetres squared | $mm^2$ |
| $ft^2$ | square feet | 0.093 | metres squared | $m^2$ |
| $yd^2$ | square yards | 0.836 | metres squared | $m^2$ |
| ac | acres | 0.405 | hectares | ha |
| $mi^2$ | square miles | 2.59 | kilometres squared | $km^2$ |
| | | **VOLUME** | | |
| fl oz | fluid ounces | 29.57 | mililitres | mL |
| gal | gallons | 3.785 | Litres | L |
| $ft^3$ | cubic feet | 0.028 | metres cubed | $m^3$ |
| $yd^3$ | cubic yards | 0.765 | metres cubed | $m^3$ |

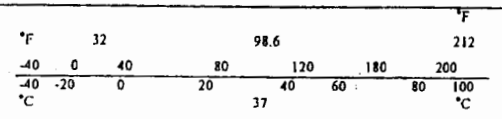
NOTE: Volumes greater than 1000 L shall be shown in $m^3$

| | | | | |
|---|---|---|---|---|
| | | **MASS** | | |
| oz | ounces | 28.35 | grams | g |
| lb | pounds | 0.454 | kilograms | kg |
| T | short tons (2000 lb) | 0.907 | megagrams | Mg |
| | | **TEMPERATURE (exact)** | | |
| °F | Fahrenheit temperature | 5(F-32)/9 | Celcius temperature | °C |

* SI is the symbol for the International System of Measurement

## APPROXIMATE CONVERSIONS TO SI UNITS

| Symbol | When You Know | Multiply By | To Find | Symbol |
|---|---|---|---|---|
| | | **LENGTH** | | |
| mm | millimetres | 0.039 | inches | in |
| m | metres | 3.28 | feet | ft |
| m | metres | 1.09 | yards | yd |
| km | kilometres | 0.621 | miles | mi |
| | | **AREA** | | |
| $mm^2$ | millimetres squared | 0.0016 | square inches | $in^2$ |
| $m^2$ | metres squared | 10.764 | square feet | $ft^2$ |
| ha | hectares | 2.47 | acres | ac |
| $km^2$ | kilometres squared | 0.386 | square miles | $mi^2$ |
| | | **VOLUME** | | |
| mL | millilitres | 0.034 | fluid ounces | fl oz |
| L | litres | 0.264 | gallons | gal |
| $m^3$ | metres cubed | 35.315 | cubic feet | $ft^3$ |
| $m^3$ | metres cubed | 1.308 | cubic yards | $yd^3$ |
| | | **MASS** | | |
| g | grams | 0.035 | ounces | oz |
| kg | kilograms | 2.205 | pounds | lb |
| Mg | megagrams | 1.102 | short tons (2000 lb) | T |
| | | **TEMPERATURE (exact)** | | |
| °C | Celcius temperature | 1.8C+32 | Fahrenheit temperature | °F |



## TABLE OF CONTENTS

# 1. INTRODUCTION

In 1990, motor vehicle accidents accounted for 45,000 deaths in the United States. This is the equivalent of a major airline crash every day for 365 days. For the population in the age group 15 to 24, these accidents produced nearly twice the number of deaths as the next closest cause. Comparable statistics may be cited for personal injuries and property damage.

Recognizing the staggering costs of highway motor vehicle accidents, Congress has provided for the establishment of Highway Safety Programs in each of the states. The Governors are responsible for the administration of these programs through a state agency. In Connecticut, that agency is the Department of Transportation (ConnDOT). Within ConnDOT, the Office of Highway Safety (OHS) has responsibility for the administration of the Community Traffic Safety Programs (CTSPs) and Motorcycle Operator Training Program (CONREP). Clearly, there is need to periodically evaluate these programs. The research described herein provides such an evaluation.

There were two objectives of the research:

- Examine the effectiveness of the Community Traffic Safety Programs
- Examine the effectiveness of the Connecticut Rider Program

The primary instruments upon which the analyses are based are two surveys and a review of motorcycle accident records. It is important to note that the evaluation of "effectiveness" from the surveys is largely subjective, based on the perceptions of the general public (CTSPs) and/or CONREP graduates.

Following this introduction, a brief literature review is presented. Next come two major sections devoted to the two programs which were evaluated. Each of these includes a

description of the methodology, findings, and recommendations. Data are tabulated in appendixes.

## 2. LITERATURE REVIEW

The literature review identified only two reports dealing specifically with CTSPs. The first one is an undated report by the National Highway Traffic Safety Administration (NHTSA)[1], which describes the origins of the program and the general characteristics of programs around the U.S. The report also notes that the ingredients of a successful CTSP vary across States and communities. However, it offers the following general suggestions:

- Control of the CTSP must reside within the community.
- Participation should include multiple public and private elements.
- For long-term success, a strong, representative task force is very important.
- The CTSP needs a stable position in the community hierarchy, possibly (and sometimes preferably) as a stand-alone agency or department.
- If this stable position is within some single purpose agency, such as Police or Health, it is important that the CTSP not become totally identified with the host agency's mission.
- The CTSP coordinator is critical to CTSP success. Coordinator technical skills are less important than marketing, organization, management, and administration within, most typically, a public sector environment.
- CTSPs seem to work best in naturally defined communities ranging in size from about 50,000 to more than 500,000. In communities of less than 50,000, it may be difficult to develop enough people and resources to support CTSP

activity. Communities larger than 500,000 often already have viable single issue organizations for child restraints, bicycle safety, etc. Successful comprehensive CTSPs in these large communities are rare and organizationally complex.

The other report specific to CTSPs[2] is a series of case studies of seven programs. Although there is much valuable information in both of these publications, neither attempts to define "success".

There is a considerable body of literature on motorcycle safety in general. An extensive review is given by Chesham, Rutter and Quine[3]. Those authors note three "periods" of motorcycle safety research. During the first period (the 1970's) , the primary emphasis of research was to identify and control factors contributing to accident *severity* . For example, the use of helmets to reduce head injuries and the daytime use of headlamps to reduce multi-vehicle collisions. Of particular interest in the present context is work done in the second period from the late 1970's through the 1980's. Specifically, these studies involved the concept of "riding analysis" which includes *skills testing, training evaluation, and perceived risk.* The riding analysis approach was summarized by Prem and Good[4] . "The rider/cycle system is a closely coupled dynamic system, with overall performance dependent upon both the handling characteristics of the motorcycle, and the rider's level of skill in controlling the motor cycle" [p. 9].

The Motorcycle Operator Skills Test (MOST), developed by McPherson and McKnight[5], consists of nine riding exercises of increasing difficulty such as starting n an incline and stopping on a curve. Several investigators have attempted to determine the

relationship between performance on the MOST and on-street riding skills, with mixed results. For example, Jonah and Dawson[6] compared the performance of 18 novice riders with ratings of their on-street performance and found the results to be "significant". However, in a more comprehensive analysis of 637 riders by the same authors, it was found that "riders who had taken a training course were *less likely* to pass the MOST"... and that "from multiple regression, it emerged that the most important predictors of MOST score were age and sex: younger, male drivers performed best". Moreover, in a subsequent study[7], Jonah, Dawson and Bragg, found that performance on the MOST *did not* predict motorcyclists' accident records.

The Alternative Skills Test (AST), developed by Prem and Good, added the elements of surprise and decision-making to the standard MOST. Multiple regression using the AST "revealed virtually identical predictors as for the MOST...". Mortimer[8, 9] compared the performance of graduates of the American Motorcycle Safety Foundation course with that of a control group and found that "those who have taken the course did not have a lower violation rate, a lower accident rate, a lower total cost of damage to accident-involved motorcycles , a significantly lower mean cost of injury treatment per accident, or a lower total cost of injury treatment". Mortimer also concluded that individual attitudes toward risk taking may also be important. The statistical complexities of the studies are amplified by McDavid, Lohrmann and Lohrmann[10].

Given the sometimes contradictory and counter-intuitive findings of previous research, it is clear the analysis of the effects of CONREP is not a trivial task.

## 3. COMMUNITY TRAFFIC SAFETY PROGRAMS

Prior to and during 1995, there were four Community Traffic Safety Programs in

operation in Connecticut. Each of these were housed in a public agency: the Stratford Police Department, The University of Connecticut (UConn) Police Department, the Waterbury Health Department, and the Waterford Police Department. The operation of these programs is described in a previous report[11].

The evaluation of the effectiveness of the CTSP's presented herein is based on the results of a telephone survey of a randomly selected sample of 1000 persons from the general, non-institutionalized population, 18 years of age and older. The survey questionnaire was designed by the principal investigator and the OHS. It was then reviewed by the University of Connecticut Institute for Social Inquiry/Roper Center (ISI/Roper) to insure that proper poling techniques were used and that it could be administered in no more than five minutes. The survey was conducted by ISI/Roper during the spring of 1996. The questionnaire is given as Appendix A.

### 3.1 CTSP Survey Results.

A complete listing of the survey results is given in Appendix B. Some key findings are given below.

- Slightly more than ten percent of the surveyed population had seen or heard about a CTSP.
- Of those who had heard about a CTSP, the percentages were:

  Stratford - 5 percent

  UConn - 17 percent

  Waterbury - 14 percent

  Waterford - 8.5 percent

- Of those who had heard about, or used the services of, a CTSP, 56 percent rated them to be "very" valuable while 34 percent rated them to be "somewhat" valuable.
- Eighteen percent of the respondents had seen pencils or key chains saying "Buckle up for Safety" and 6.4 percent had actually used them. Of those who had used them, only 5 percent had obtained them from a CTSP. Thus, less than one (0.3) percent of the population surveyed had used pencils or key chains provided directly to them by an CTSP.
- Nearly 70 percent of those who had used the pencils or key chains thought them to be "somewhat" or "very" effective.
- Although about 23 percent of respondents had seen bumper stickers saying "Share the Road with Motorcycles", only one percent had actually used them. Of this one percent, 18 percent obtained them from a CTSP.
- About 60 percent of those who had seen the bumper stickers rated them as "somewhat" effective, while 8 percent rated them as "very" effective.
- Essentially all of the respondents lived in a household that, at one time or another, had included children. Of these, about 20 percent had received formal training. Of the 20 percent who had received formal training, about three percent received it from a CTSP.
- Slightly more than nine percent of those who had been associated with the formal bicycle training rated it as "somewhat" effective while eight percent rated it as "very" effective.

- Only about ten percent of respondents had received instruction on the proper installation of child restraint seats. Of these, slightly more than eight percent received it from a CTSP.
- Almost 56 percent of those who received instruction on the installation of child restraint seats rated that instruction as "very" effective; a remaining 34 percent rated it as "somewhat" effective.
- Eighty-two percent of the respondents believed there is a law requiring children to wear a helmet when riding a bicycle.
- Over 64 percent of respondents claimed to always wear a safety belt, while about 18 percent wear a safety belt "most of the time". Only six percent admitted to never wearing a safety belt.
- Over 85 percent of the respondents were aware that they could be stopped and ticketed for not wearing a safety belt.
- When asked where they would obtain educational materials dealing with drunk driving or encouraging the use of safety belts, almost seven percent of respondents would contact a CTSP while 31 percent would obtain them from a police department and 32 percent from the Department of Motor Vehicles.
- About 8 percent of respondents were motorcycle operators. Of these, 24 percent had been involved in a motorcycle accident at some time.
- Of the motorcycle operators, 40 percent claimed to always wear a helmet and 16 percent said they wear a helmet "most of the time". Nearly 28 percent admitted to never wearing a helmet. Nearly 39 percent said they always wear

a protective jacket, 27 percent wear a jacket "most of the time", and only three percent never wear a jacket.

- Twenty-seven respondents, or 2.7 percent had taken CONREP. Nineteen of these individuals rated the program as "very " valuable, six rated it "somewhat" valuable, and two rated it not valuable.

### 3.2 Discussion of CTSP Results

Respondents were very favorably impressed with the materials and training provided by the CTSPs and by the CTSPs themselves ***if they were aware of them.*** For example, 90 percent of the respondents who had dealt with a CTSP judged them to be "somewhat" or "very" valuable.

The data seem to suggest that educational materials such as the pencils, key chains, and bumper stickers are at least somewhat effective. For example, about 16 percent of respondents had seen bumper stickers saying "Share the Road with Motorcycles" and believed them to be "somewhat" or "very" effective. However, less than 0.2 percent of respondents had used a bumper sticker provided to them by a CTSP.

Those respondents who had been involved with formal bicycle education, were not generally impressed with it. Thus, only about 17 percent rated it at least somewhat effective. On the other hand, the very small sample of respondents (27) who had taken the CONREP course were nearly unanimous in their praise of that course.

The small (10 percent) percentage of respondents who had received training in the installation of child restraint seats was overwhelmingly positive in their evaluation of the

effectiveness of this training. Ninety percent of those respondents found the training to be very or somewhat effective.

With regard to safety belts and motorcycle helmets, the respondents claim a level of usage considerably greater than recent field surveys indicate. For example, 92 percent of respondents claimed to wear a safety belt "most of the time", while surveys[12] in Connecticut found only about 60 percent of drivers and front seat passengers wearing them. Similar disparities exist for motorcycle helmet usage.

## 4. THE CONNECTICUT RIDER PROGRAM

The effectiveness of CONREP was examined two ways. In the first, all the records of accidents involving a motorcycle during 1994 were examined. The operator numbers were compared against a list of operator numbers of CONREP graduates. From these records, a number of statistics were tabulated and analyzed. The second means of evaluating the effectiveness was through a telephone survey of 100 CONREP graduates. The primary use of this survey was to provide a "perceived" (by the graduate) value of the training.

### 4.1 Accident Records

**Procedure**

The survey and analysis of accident records proceeded as follows:

1. A list of operator numbers for the 9320 CONREP graduates was obtained from the Office of Highway Safety.
2. Accident records for the year 1994 involving motorcycles were examined and accidents involving an operator who was a CONREP graduate were extracted. About 39 of the 893 operators involved in accidents were CONREP graduates.

3. The accident rates (accidents per motorcyclist) of graduates and non-graduates were calculated and compared.

4. The comparison described in step 3 was repeated with each of the two groups being separated into those over 35 years of age and those under 35.

5. Steps 3 and 4 were repeated for the severity of accidents, responsibility, and helmet usage.

**Results**

A complete tabulation of the results and description of computations are given in Appendix C. Key findings are summarized below.

- CONREP graduates had an accident rate of about one-fifth of non-graduates. This was found to be significant at the 95% confidence level.
- Improvement in safety records associated with CONREP graduates was greatest for the under 35 years of age group.
- CONREP graduates had less severe accidents than non-graduates.
- There was no significant difference between graduates and non-graduates in terms of responsibility.

## 4.2 Telephone Survey

**Procedure**

The names, telephone numbers, sex, and year of birth of nearly 350 graduates of CONREP were randomly selected from the files of OHS. Class lists were randomly selected from each motorcycle course location and two students who completed and passed the course were randomly selected from each selected class. Only those classes conducted from 1993 to

1995 were selected for the study.

During the survey, the former students were asked twenty-four questions (see Appendix D). Those students who were not currently driving a motorcycle , either because they did not own a motorcycle or were not licensed to operate a motorcycle, were not asked questions twelve through twenty-four. The answers for each call were recorded on individual response sheets. Space was provided on the response sheets for comments and/or recommendations ,made by the students.

Phone calls were made on weekdays between 5:00 pm and 10:00 pm and between noon and 1:00 pm. Calls were also made on Saturdays from 10:00 am to noon. If a person could not be reached, an attempt was made to reach that person at a different time.

**Results**

A complete tabulation of the results of the telephone survey is given in Appendix E. Probably the most significant finding was that an overwhelming number of the graduates had high praise for the course. Some other findings are summarized below.

Nearly everyone interviewed found CONREP to be beneficial. The majority of the students found the instructors to be excellent and the materials covered in the course to be very helpful. Nearly all of the participants stated that the course either met or exceeded their expectations. The following, is a list of general recommendations provided by the students:

- A number of students indicated that they would have preferred to have had longer sessions or more motorcycle sessions.

- Some felt that there should be more time available for riding the motorcycle than being in the classroom.

- Some people recommended that more classes be made available (basic and experienced) and at more locations. Additionally, some people stated that the program needs better publicity.

- One student quit the course the first time because of the pressure of the course ( she related the course to a boot camp experience). She recommended that the course should be extended an extra day and possibly have the basic course split into two groups. One group consisting of those who have never ridden a motorcycle and one group with those who have some experience.

- Give the riding test separate day, not at the end of the day when the students are tired

- One person recommended teaching with better motorcycles.

The following are additional subjects that students felt should also be covered:

- Practice starting on hills or slopes.

- Need rainy day practice (foul weather)

- More time spent turning.

- Practice riding on highway or at higher speeds, no practice shifting into higher gears.

- Recommended more classroom videos.

- Teach basic first aid principles.

- Recommend teaching two-up on the motorcycle.
- Go out onto the road for a t least one trip.
- Tips on minor bike maintenance (ex. Check chains).
- Tips on riding on poor roads (potholes, construction cuts, etc.).
- Tips on buying a motorcycle.

The following are comments made by participants during the survey:

- Format was well thought out - progressive - excellent - well conducted.
- Very informative- recommended it to my friends and family.
- It was a very extensive course - the course was good for breaking my bad driving habits.
- Make it a requirement of everyone who rides a motorcycle.
- Very impressed with entire course.
- Instructors were very helpful.
- Two separate people passed the class and expected to receive their motorcycle license endorsements immediately following after the course, not realizing that they had to take a written test at the DMV. Once they found out, they did not have the time to go to the DMV to take the test within the 30 day period. Consequently, they did not get a motorcycle license endorsement.

- The course was very good - as a result of the course, decided that motorcycle riding was not for him.
- The course was worth its cost.
- One of the better safety course he has ever taken. The course also improved his automobile driving as well.
- Instructor displayed good patience.
- Instructor was good enough to allow extra time on the bikes. The slides shown in the class of potential dangers were very good but the instructor was a little too casual. Great course - great instructors - could not rate it any better.
- "World's best kept secret".

## 5. CONCLUSIONS

As noted at the outset, the evaluations of "effectiveness" of the Community Traffic Safety Programs and CONREP based on the two surveys is largely subjective. With this caveat, the results of this study indicate may be summarized as follows:

- A very small percentage of the general population is aware of the existence of the CTSPs.
- Those who have had dealings with a CTSP were overwhelmingly positive in their evaluation of the program.
- Educational materials were judged to be worthwhile, but few people could

associate them with a CTSP.

- Formal training in bicycle operation was not seen to be very effective and almost no respondents indicated they had received such training from a CTSP.

- CONREP is perceived by graduates as quite valuable; they were nearly unanimous in their praise.

- Comparison of accident experience of CONREP graduates and non-graduates shows graduates to be far safer operators than non-graduates.

The quantitative findings from the review of motorcycle accident records must be tempered by two observations. First, it was impossible, within the scope of this study, to account for exposure because there is no readily available data on miles of travel of the two groups. Second, there is no straightforward way of eliminating the possibility that persons who take the CONREP program are simply more cautious than the general population of motorcycle operators.

**REFERENCES**

1. National Highway Traffic Safety Administration. *Community Traffic Safety Programs: Review and Analysis*, 7 pp. ND.

2. National Highway Traffic Safety Administration. *Community Traffic Safety Programs*, DOT HS 807 391, March 1989.

3. Chesham, D. J., Rutter, D. R. and L. Quine. "Motorcycle "Motorcycling Safety Research: a Review of the Social and Behavioral Literature", *Soc. Sci. Med.*, Vol. 37, No. 3, pp.419-429, 1993.

4. Prem, H. and M. C. Good. *Motorcycle Skills Assessment.* Australian Office of Road Safety, Melbourne, 1984. (Cited by Chesham et al.)

5. McPherson, K. and A. J. McKnight. "A task analytic approach to development of a motorcycle operator license skill test. *Hum. Factors* **18**, pp. 351-360. (Cited by Chesham et al.)

6. Jonah, B. A. and N. E. Dawson. "Validation of the motorcycle operator skill test". *Accident Analysis and Prevention,* **11**, 163-171, 1979 (Cited by Chesham et al.).

7. Jonah, B. A., Dawson N. E. and B. W. E. Bragg. "Predicting accident involvement with the motorcycle operator skill test". *Accident Analysis and Prevention*, **13**, 307-318, 1981, (Cited after Chesham et al.)

8. Mortimer, R. G. "An evaluation of the motorcycle rider course". *Accident Analysis and Prevention* **16**, 63-71, 1984, (Cited by Chesham et al.).

9. Mortimer, R. G. "A further evaluation of the motorcycle rider course", *J. Safety Res.* **20**, 61-72, 1989.

10. McDavid, J. C., Lohrmann B. A. and G. Lohrmann."Does motorcycle training reduce accidents? Evidence from a longitudinal quasi-experimental study", *J. Safety Res.* **20**, 61-72, 1989 (Cited by Chesham et al.)

11. Davis, C. F., Evaluation of Community Traffic Safety Programs and Motorcycle Operator Training Programs, Interim Report, Project 95-4, Civil and Environmental Engineering Department, University of Connecticut, Storrs, December 1995, 13 pp.

12. Davis, C. F. and C. I. Vinsonhaler, Safety Belt/Motorcycle Helmet Usage Surveys. Final Report. JHR 96-248, Civil and Environmental Engineering Department, University of Connecticut, Storrs, CT, March 1996, 12 pp.

# APPENDIX A - ISI/ROPER SURVEY

## METHODOLOGY USED FOR THE TRAFFIC SAFETY SURVEY RESEARCH PROJECT

conducted for

## THE TRANSPORTATION INSTITUTE

by

## THE INSTITUTE FOR SOCIAL INQUIRY

The 1000 interviews for this project were conducted by telephone from April 24 through May 22, 1996, with a random sample of non-institutionalized Connecticut residents aged 18 or over. The study has a margin of error of about plus or minus 3.5%. Thus, for percentages around 50%, if all eligible respondents were asked a question and 50% of the sample fell into a given response category, there is a one in twenty chance that the results for the entire state population would have been higher than 53.5% or lower than 46.5% The margin of error shrinks for percentages much larger or smaller than 50%, but increases for subgroups smaller than the entire sample.

Surveys are also subject to other sources of error for which precise estimates cannot be calculated. For example, different question wording might obtain different results, or events occurring during or after the interviewing period could have changed the results.

The basic sampling procedure used is a variation of random-digit dialing which has been used on all state-wide, general population surveys that ISI has conducted in Connecticut. Working residential "blocks" (which share the first five digits, e.g. 555-1234 and 555-1212 would be in the same "block") are identified with the aid of published directories. These exchanges are chosen in a modified stratified procedure based on the proportion of the theoretical universe residing in the geographic area covered by each published directory. Thus, in general, if 10% of the universe lives in the area covered by a directory, 10% of the exchanges will be chosen from that area. The universe for this study is the adult non-institutionalized population 18 years of age and older. The geographic distribution used in sampling is based on estimates of the distribution derived from the Census figures for towns.

Once "working blocks" are identified, one telephone number is generated at random for each block. A household is given four distinct opportunities to be contacted before a substitution is made for it. Once determination is made that the household does, in fact, contain an eligible respondent, a random selection--unbiased on age and sex among the eligible respondents--is made. If the selected respondent is not at home or is not available, an appointment is made to call back. The definition of "household" used is adults 18 years of age and older who lived in the dwelling place. Such institutions as college dormitories, prisons, and the like are omitted.

All interviewing is done from ISI offices on evenings and weekends. Interviewers are trained to follow the questionnaire exactly, without further explaining questions or reacting to whatever responses the questions elicit. A supervisor is on duty at all time to monitor performance and to speak to any respondents who are unsure that the survey is genuine. Completed questionnaires are checked and entered into a dataset which is subjected to "cleaning" programs to ensure its accuracy.

Page 1

SPECIAL SURVEY #183 - TRAFFIC SAFETY PROJECT
Transportation Institute, Univ. of Connecticut
April - 1996

Hello, I'm calling from the University of Connecticut. We are doing a survey to find out about some traffic safety issues. The results will be used to plan better programs for Connecticut residents.

NOTE: All answers will be kept strictly confidential; no-one will know how they answered. It will take about 5 minutes.

INTS: CIRCLE SELECTION CODE. USE 1 OR TWO AS APPROPRIATE. DO NOT SUBSTITUTE RESPONDENTS.

1. Can you please tell me which person age 18 or over in your household had the most recent birthday? (If not person on phone - May I please speak to him/her? Make an appointment to call back if necessary.)

2. Can you please tell me which person age 18 or over in your household is going to have the next birthday? (If not person on phone - May I please speak to him/her? Make an appointment to call back if necessary.)

_____ TIME STARTED

_____ TEL NUMBER

_____ SHEET NUMBER

_____ SELECTION CODE

_____ CALL NUMBER

_____ DATE

Q01. NOTE BUT DO NOT ASK: Sex
(1) Male
(2) Female

Q02. Have you seen or used pencils or key chains that say "Buckle Up for Safety" on them? (IF YES: Was that seen or used, or both?)
(1) Yes, Seen only → SKIP TO Q04.
(2) Yes, Used or Both
(3) No → SKIP TO Q05.
(9) DK/Refused

Q03. Where did you get the pencils or key chains - from one of the Community Traffic Safety Programs, state or local police, or somewhere else?
(0) Not asked
(1) Traffic safety program
(2) Police
(3) Somewhere else
(9) DK/Refused

Page 1

SPECIAL SURVEY #183 - TRAFFIC SAFETY PROJECT
Transportation Institute, Univ. of Connecticut
April - 1996

Hello, I'm calling from the University of Connecticut. We are doing a survey to find out about some traffic safety issues. The results will be used to plan better programs for Connecticut residents.

NOTE: All answers will be kept strictly confidential; no-one will know how they answered. It will take about 5 minutes.

INTS: CIRCLE SELECTION CODE. USE 1 OR TWO AS APPROPRIATE. DO NOT SUBSTITUTE RESPONDENTS.

1. Can you please tell me which person age 18 or over in your household had the most recent birthday? (If not person on phone - May I please speak to him/her? Make an appointment to call back if necessary.)

2. Can you please tell me which person age 18 or over in your household is going to have the next birthday? (If not person on phone - May I please speak to him/her? Make an appointment to call back if necessary.)

_____ TIME STARTED

_____ TEL NUMBER

_____ SHEET NUMBER

_____ SELECTION CODE

_____ CALL NUMBER

_____ DATE

Q01. NOTE BUT DO NOT ASK: Sex
(1) Male
(2) Female

Q02. Have you seen or used pencils or key chains that say "Buckle Up for Safety" on them? (IF YES: Was that seen or used, or both?)
(1) Yes, Seen only → SKIP TO Q04.
(2) Yes, Used or Both
(3) No → SKIP TO Q05.
(9) DK/Refused

Q03. Where did you get the pencils or key chains - from one of the Community Traffic Safety Programs, state or local police, or somewhere else?
(0) Not asked
(1) Traffic safety program
(2) Police
(3) Somewhere else
(9) DK/Refused

Page 2

Q04. In your opinion how effective are the "Buckle Up for Safety" pencils and key chains in promoting highway safety. Are they very effective, somewhat effective or not effective at all?

(0) Not asked
(1) Very
(2) Somewhat
(3) Not at all
(4) Don't know enough (vol.)
(9) DK/Refused

Q05. Have you seen or used bumper stickers that say "Share the Road with Motorcycles"? (IF YES: Was that seen or used, or both?)

(1) Yes, Seen only → SKIP TO Q07.
(2) Yes, Used or Both
(3) No → SKIP TO Q08.
(9) DK/Refused → SKIP TO Q08.

Q06. Where did you get the bumper stickers -- from one of the Community Traffic Safety Programs, state or local police, or somewhere else?

(0) Not asked
(1) Traffic safety program
(2) Police
(3) Somewhere else
(9) DK/Refused

Q07. In your opinion how effective are the "Share the Road with Motorcycles" bumper stickers in promoting highway safety. Are they very effective, somewhat effective or not effective at all?

(0) Not asked
(1) Very
(2) Somewhat
(3) Not at all
(4) Don't know enough (vol.)
(9) DK/Refused

Q08. Have you or anyone in your household ever received formal instruction on bicycle safety?

(1) Yes
(2) No → SKIP TO Q11.
(9) DK/Refused → SKIP TO Q11.

Q09. Where did they get the instruction -- from one of the Community Traffic Safety Programs, state or local police, or somewhere else?

(0) Not asked
(1) Traffic safety program
(2) Police
(3) Somewhere else
(9) DK/Refused

Page 3

Q10. In your opinion how effective is the instruction on bicycle safety in promoting highway safety. Is it very effective, somewhat effective or not effective at all?

(0) Not asked
(1) Very
(2) Somewhat
(3) Not at all
(4) Don't know enough (vol.)
(9) DK/Refused

Q11. Have you or anyone in your household ever received instruction on the proper installation of child restraint seats in a car or truck, other than the printed instructions that come with the seat or what a salesperson told you?

(1) Yes
(2) No → SKIP TO Q14.
(9) DK/Refused →

Q12. Where did you get the instruction -- from one of the Community Traffic Safety Programs, state or local police, or somewhere else?

(0) Not asked
(1) Traffic safety program
(2) Police
(3) Somewhere else
(9) DK/Refused

Q13. In your opinion how effective is the installation instruction in promoting highway safety. Is it very effective, somewhat effective or not effective at all?

(0) Not asked
(1) Very
(2) Somewhat
(3) Not at all
(4) Don't know enough (vol.)
(9) DK/Refused

Q14. As far as you know, is there a law requiring children to wear a helmet when riding a bicycle?

(1) Yes
(2) No
(9) DK/Refused

Q15. When driving or riding in a car, do you always wear a seatbelt, wear it most of the time, some of the time, or never wear it?

(1) Always
(2) Most
(3) Sometimes
(4) Never
(9) DK/Refused

Q16. As far as you know, can you be stopped and ticketed by a police officer for not wearing a seat belt?

(1) Yes
(2) No
(9) DK/Refused

Page 4

Q17. If you wanted to get some educational materials dealing with drunk driving or encouraging the use of seat belts, who would you contact - one of the Community Traffic Safety Programs, the state or local police, the Department of Motor Vehicles, or somewhere else?

(1) Traffic Safety Program
(2) State/local police
(3) Dept. Motor Vehicles
(4) Somewhere else
(5) Combo. (vol.)
(9) DK/Refused

Q18. The Department of Transportation sponsors the Community Traffic Safety Programs. Before now, had you heard or read about the program or used its services? (PROBE IF NECESSARY: Did you use its services?)

(1) Yes, heard/read only
(2) Yes, used and/or heard
(3) No → SKIP TO Q21.
(9) DK/Refused → SKIP TO Q21.

Q19. Which Community Traffic Safety Program was that -- Stratford, the University of Connecticut, Waterbury or Waterford?

(0) Not asked
(1) Stratford
(2) UConn
(3) Waterbury
(4) Waterford
(5) Somewhere else
(6) Combo.
(9) DK/Refused

Q20. How valuable are the services provided by the Community Traffic Safety Programs? Do you think they are very valuable, somewhat valuable, or not valuable at all?

(0) Not asked
(1) Very valuable
(2) Somewhat
(3) Not valuable
(4) Don't know enough (vol.)
(9) DK/Refused

Q21. Are you a motorcycle operator?

(1) Yes
(2) No → SKIP TO Q25
(9) DK/Refused → SKIP TO Q25

Q22. Have you ever been involved in a traffic accident while operating a motorcycle?

(0) Not asked
(1) Yes
(2) No
(9) DK/Refused

Page 5

Q23. When you operate a motorcycle, do you always wear a helmet, wear one most of the time, some of the time, or never?

(0) Not asked
(1) Always
(2) Most
(3) Sometimes
(4) Never
(9) DK/Refused

Q24. When you operate a motorcycle, do you always wear a protective jacket, wear one most of the time, some of the time, or never?

(0) Not asked
(1) Always
(2) Most
(3) Sometimes
(4) Never
(9) DK/Refused

Q25. (ASK EVERYONE) Have you taken the Connecticut Motorcycle Rider Education Program - CONNREP?

(1) Yes
(2) No → SKIP TO 27.
(9) DK/Refused → SKIP TO 27.

Q26. How valuable do you think this program is - very valuable, somewhat valuable, or not valuable at all?

(0) Not asked
(1) Very valuable
(2) Somewhat
(3) Not valuable
(9) DK/Refused

Finally, just a few questions to help us classify the data -

Q27. What town do you live in? _____
(999=DK, refused)

Q28. What year were you born? _____
(00=1900 or earlier; 99=DK, refused)

Q29. What is your race or ethnic background - are you:

(1) White
(2) Black
(3) Hispanic
(4) Something else
(9) DK/Refused

Page 6

Q30. About how much was your total family income last year, before taxes? Was it:

(1) Less than 10,000 dollars
(2) $10,000 up to 15,000
(3) $15,000 up to 20,000
(4) $20,000 up to 30,000
(5) $30,000 up to 50,000
(6) $50,000 up to 75,000
(7) Over $75,000
(9) DK/Refused

Thank you very much, you've been very helpful. We really appreciate your cooperation.

_____ TIME COMPLETED

_____ INTERVIEWER NAME

# APPENDIX B - ISI/ROPER SURVEY RESULTS

Q01 Sex

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Male | 1 | 476 | 47.6 | 47.6 | 47.6 |
| Female | 2 | 524 | 52.4 | 52.4 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q02 Used pencils/key chains

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes, seen only | 1 | 181 | 18.1 | 18.1 | 18.1 |
| Yes, used or both | 2 | 64 | 6.4 | 6.4 | 24.5 |
| No | 3 | 755 | 75.5 | 75.5 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q03 Where get pencil/key

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Traffic safety progr | 1 | 3 | .3 | 4.7 | 4.7 |
| Police | 2 | 9 | .9 | 14.1 | 18.8 |
| Somewhere else | 3 | 48 | 4.8 | 75.0 | 93.8 |
| Dk/refused | 9 | 4 | .4 | 6.3 | 100.0 |
| | 0 | 936 | 93.6 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 64 Missing cases 936

Page 1

SPECIAL SURVEY #183 - TRAFFIC SAFETY PROJECT
Transportation Institute, Univ. of Connecticut
April - 1996

Hello, I'm calling from the University of Connecticut. We are doing a survey to find out about some traffic safety issues. The results will be used to plan better programs for Connecticut residents.

NOTE: All answers will be kept strictly confidential; no-one will know how they answered. It will take about 5 minutes.

INTS: CIRCLE SELECTION CODE. USE 1 OR TWO AS APPROPRIATE. DO NOT SUBSTITUTE RESPONDENTS.

1. Can you please tell me which person age 18 or over in your household had the most recent birthday? (If not person on phone - May I please speak to him/her? Make an appointment to call back if necessary.)

2. Can you please tell me which person age 18 or over in your household is going to have the next birthday? (If not person on phone - May I please speak to him/her? Make an appointment to call back if necessary.)

_____ TIME STARTED

_____ TEL NUMBER

_____ SHEET NUMBER

_____ SELECTION CODE

_____ CALL NUMBER

_____ DATE

Q01. NOTE BUT DO NOT ASK: Sex
(1) Male
(2) Female

Q02. Have you seen or used pencils or key chains that say "Buckle Up for Safety" on them? (IF YES: Was that seen or used, or both?)
(1) Yes, Seen only → SKIP TO Q04.
(2) Yes, Used or Both
(3) No → SKIP TO Q05.
(9) DK/Refused → SKIP TO Q05.

Q03. Where did you get the pencils or key chains - from one of the Community Traffic Safety Programs, state or local police, or somewhere else?
(0) Not asked
(1) Traffic safety program
(2) Police
(3) Somewhere else
(9) DK/Refused

Page 2

Q04. In your opinion how effective are the "Buckle Up for Safety" pencils and key chains in promoting highway safety. Are they very effective, somewhat effective or not effective at all?

(0) Not asked
(1) Very
(2) Somewhat
(3) Not at all
(4) Don't know enough (vol.)
(9) DK/Refused

Q05. Have you seen or used bumper stickers that say "Share the Road with Motorcycles"? (IF YES: Was that seen or used, or both?)

(1) Yes, Seen only → SKIP TO Q07.
(2) Yes, Used or Both
(3) No → SKIP TO Q08.
(9) DK/Refused → SKIP TO Q08.

Q06. Where did you get the bumper stickers -- from one of the Community Traffic Safety Programs, state or local police, or somewhere else?

(0) Not asked
(1) Traffic safety program
(2) Police
(3) Somewhere else
(9) DK/Refused

Q07. In your opinion how effective are the "Share the Road with Motorcycles" bumper stickers in promoting highway safety. Are they very effective, somewhat effective or not effective at all?

(0) Not asked
(1) Very
(2) Somewhat
(3) Not at all
(4) Don't know enough (vol.)
(9) DK/Refused

Q08. Have you or anyone in your household ever received formal instruction on bicycle safety?

(1) Yes
(2) No → SKIP TO Q11.
(9) DK/Refused → SKIP TO Q11.

Q09. Where did they get the instruction -- from one of the Community Traffic Safety Programs, state or local police, or somewhere else?

(0) Not asked
(1) Traffic safety program
(2) Police
(3) Somewhere else
(9) DK/Refused

Page 3

Q10. In your opinion how effective is the instruction on bicycle safety in promoting highway safety. Is it very effective, somewhat effective or not effective at all?

(0) Not asked
(1) Very
(2) Somewhat
(3) Not at all
(4) Don't know enough (vol.)
(9) DK/Refused

Q11. Have you or anyone in your household ever received instruction on the proper installation of child restraint seats in a car or truck, other than the printed instructions that come with the seat or what a salesperson told you?

(1) Yes
(2) No → SKIP TO Q14.
(9) DK/Refused →

Q12. Where did you get the instruction -- from one of the Community Traffic Safety Programs, state or local police, or somewhere else?

(0) Not asked
(1) Traffic safety program
(2) Police
(3) Somewhere else
(9) DK/Refused

Q13. In your opinion how effective is the installation instruction in promoting highway safety. Is it very effective, somewhat effective or not effective at all?

(0) Not asked
(1) Very
(2) Somewhat
(3) Not at all
(4) Don't know enough (vol.)
(9) DK/Refused

Q14. As far as you know, is there a law requiring children to wear a helmet when riding a bicycle?

(1) Yes
(2) No
(9) DK/Refused

Q15. When driving or riding in a car, do you always wear a seatbelt, wear it most of the time, some of the time, or never wear it?

(1) Always
(2) Most
(3) Sometimes
(4) Never
(9) DK/Refused

Q16. As far as you know, can you be stopped and ticketed by a police officer for not wearing a seat belt?

(1) Yes
(2) No
(9) DK/Refused

Page 4

Q17. If you wanted to get some educational materials dealing with drunk driving or encouraging the use of seat belts, who would you contact - one of the Community Traffic Safety Programs, the state or local police, the Department of Motor Vehicles, or somewhere else?

(1) Traffic Safety Program
(2) State/local police
(3) Dept. Motor Vehicles
(4) Somewhere else
(5) Combo. (vol.)
(9) DK/Refused

Q18. The Department of Transportation sponsors the Community Traffic Safety Programs. Before now, had you heard or read about the program or used its services? (PROBE IF NECESSARY: Did you use its services?)

(1) Yes, heard/read only
(2) Yes, used and/or heard
(3) No → SKIP TO Q21.
(9) DK/Refused → SKIP TO Q21.

Q19. Which Community Traffic Safety Program was that -- Stratford, the University of Connecticut, Waterbury or Waterford?

(0) Not asked
(1) Stratford
(2) UConn
(3) Waterbury
(4) Waterford
(5) Somewhere else
(6) Combo.
(9) DK/Refused

Q20. How valuable are the services provided by the Community Traffic Safety Programs? Do you think they are very valuable, somewhat valuable, or not valuable at all?

(0) Not asked
(1) Very valuable
(2) Somewhat
(3) Not valuable
(4) Don't know enough (vol.)
(9) DK/Refused

Q21. Are you a motorcycle operator?

(1) Yes
(2) No → SKIP TO Q25
(9) DK/Refused → SKIP TO Q25

Q22. Have you ever been involved in a traffic accident while operating a motorcycle?

(0) Not asked
(1) Yes
(2) No
(9) DK/Refused

Page 5

Q23. When you operate a motorcycle, do you always wear a helmet, wear one most of the time, some of the time, or never?

(0) Not asked
(1) Always
(2) Most
(3) Sometimes
(4) Never
(9) DK/Refused

Q24. When you operate a motorcycle, do you always wear a protective jacket, wear one most of the time, some of the time, or never?

(0) Not asked
(1) Always
(2) Most
(3) Sometimes
(4) Never
(9) DK/Refused

Q25. (ASK EVERYONE) Have you taken the Connecticut Motorcycle Rider Education Program - CONNREP?

(1) Yes
(2) No → SKIP TO 27.
(9) DK/Refused → SKIP TO 27.

Q26. How valuable do you think this program is - very valuable, somewhat valuable, or not valuable at all?

(0) Not asked
(1) Very valuable
(2) Somewhat
(3) Not valuable
(9) DK/Refused

Finally, just a few questions to help us classify the data -

Q27. What town do you live in? _____
(999=DK, refused)

Q28. What year were you born? _____
(00=1900 or earlier; 99=DK, refused)

Q29. What is your race or ethnic background - are you:

(1) White
(2) Black
(3) Hispanic
(4) Something else
(9) DK/Refused

Page 6

Q30. About how much was your total family income last year, before taxes? Was it:

(1) Less than 10,000 dollars
(2) $10,000 up to 15,000
(3) $15,000 up to 20,000
(4) $20,000 up to 30,000
(5) $30,000 up to 50,000
(6) $50,000 up to 75,000
(7) Over $75,000
(9) DK/Refused

Thank you very much, you've been very helpful. We really appreciate your cooperation.

_____ TIME COMPLETED

_____ INTERVIEWER NAME

# APPENDIX B - ISI/ROPER SURVEY RESULTS

Q01 Sex

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Male | 1 | 476 | 47.6 | 47.6 | 47.6 |
| Female | 2 | 524 | 52.4 | 52.4 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q02 Used pencils/key chains

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes, seen only | 1 | 181 | 18.1 | 18.1 | 18.1 |
| Yes, used or both | 2 | 64 | 6.4 | 6.4 | 24.5 |
| No | 3 | 755 | 75.5 | 75.5 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q03 Where get pencil/key

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Traffic safety progr | 1 | 3 | .3 | 4.7 | 4.7 |
| Police | 2 | 9 | .9 | 14.1 | 18.8 |
| Somewhere else | 3 | 48 | 4.8 | 75.0 | 93.8 |
| Dk/refused | 9 | 4 | .4 | 6.3 | 100.0 |
| | 0 | 936 | 93.6 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 64 Missing cases 936

Q04 How effective pencil/key

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Very | 1 | 32 | 3.2 | 13.1 | 13.1 |
| Somewhat | 2 | 137 | 13.7 | 55.9 | 69.0 |
| Not at all | 3 | 49 | 4.9 | 20.0 | 89.0 |
| Don't know enough | 4 | 12 | 1.2 | 4.9 | 93.9 |
| Dk/refused | 9 | 15 | 1.5 | 6.1 | 100.0 |
| | 0 | 755 | 75.5 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 245 Missing cases 755

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q05 Seen/used bumper stickers

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes, seen only | 1 | 234 | 23.4 | 23.4 | 23.4 |
| Yes, used or both | 2 | 11 | 1.1 | 1.1 | 24.5 |
| No | 3 | 754 | 75.4 | 75.4 | 99.9 |
| Dk/refused | 9 | 1 | .1 | .1 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q06 Where get bumper

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Traffic safety progr | 1 | 2 | .2 | 18.2 | 18.2 |
| Somewhere else | 3 | 8 | .8 | 72.7 | 90.9 |
| Dk/refused | 9 | 1 | .1 | 9.1 | 100.0 |
| | 0 | 989 | 98.9 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 11 Missing cases 989

Q07 How effective bumper

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Very | 1 | 20 | 2.0 | 8.2 | 8.2 |
| Somewhat | 2 | 146 | 14.6 | 59.6 | 67.8 |
| Not at all | 3 | 62 | 6.2 | 25.3 | 93.1 |
| Don't know enough | 4 | 12 | 1.2 | 4.9 | 98.0 |
| Dk/refused | 9 | 5 | .5 | 2.0 | 100.0 |
| | 0 | 755 | 75.5 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 245 Missing cases 755

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q08 Formal bike instruction

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes | 1 | 203 | 20.3 | 20.3 | 20.3 |
| No | 2 | 793 | 79.3 | 79.3 | 99.6 |
| Dk/refused | 9 | 4 | .4 | .4 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q09 Where get bike instructions

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Traffic safety progr | 1 | 31 | 3.1 | 15.3 | 15.3 |
| Police | 2 | 55 | 5.5 | 27.1 | 42.4 |
| Somewhere else | 3 | 109 | 10.9 | 53.7 | 96.1 |
| Dk/refused | 9 | 8 | .8 | 3.9 | 100.0 |
| | 0 | 797 | 79.7 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 203 Missing cases 797

Q10 How effective bike

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Very | 1 | 80 | 8.0 | 39.4 | 39.4 |
| Somewhat | 2 | 94 | 9.4 | 46.3 | 85.7 |
| Not at all | 3 | 16 | 1.6 | 7.9 | 93.6 |
| Don't know enough | 4 | 8 | .8 | 3.9 | 97.5 |
| Dk/refused | 9 | 5 | .5 | 2.5 | 100.0 |
| | 0 | 797 | 79.7 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 203 Missing cases 797

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q11 Child restraint seats

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes | 1 | 95 | 9.5 | 9.5 | 9.5 |
| No | 2 | 898 | 89.8 | 89.8 | 99.3 |
| Dk/refused | 9 | 7 | .7 | .7 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q12 Where get instructions

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Traffic safety progr | 1 | 8 | .8 | 8.4 | 8.4 |
| Police | 2 | 12 | 1.2 | 12.6 | 21.1 |
| Somewhere else | 3 | 70 | 7.0 | 73.7 | 94.7 |
| Dk/refused | 9 | 5 | .5 | 5.3 | 100.0 |
| | 0 | 905 | 90.5 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 95 Missing cases 905

Q13 How effective seat

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Very | 1 | 53 | 5.3 | 55.8 | 55.8 |
| Somewhat | 2 | 32 | 3.2 | 33.7 | 89.5 |
| Not at all | 3 | 2 | .2 | 2.1 | 91.6 |
| Don't know enough | 4 | 3 | .3 | 3.2 | 94.7 |
| Dk/refused | 9 | 5 | .5 | 5.3 | 100.0 |
| | 0 | 905 | 90.5 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 95 Missing cases 905

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q14 Law requiring helmet

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes | 1 | 820 | 82.0 | 82.0 | 82.0 |
| No | 2 | 104 | 10.4 | 10.4 | 92.4 |
| Dk/refused | 9 | 76 | 7.6 | 7.6 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q15 Wear seatbelt

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Always | 1 | 645 | 64.5 | 64.5 | 64.5 |
| Most | 2 | 185 | 18.5 | 18.5 | 83.0 |
| Sometimes | 3 | 109 | 10.9 | 10.9 | 93.9 |
| Never | 4 | 60 | 6.0 | 6.0 | 99.9 |
| Dk/refused | 9 | 1 | .1 | .1 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

Q16 Stopped for not wearing seatbelt

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes | 1 | 854 | 85.4 | 85.4 | 85.4 |
| No | 2 | 117 | 11.7 | 11.7 | 97.1 |
| Dk/refused | 9 | 29 | 2.9 | 2.9 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q17 Educational materials

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Traffic safety progr | 1 | 67 | 6.7 | 6.7 | 6.7 |
| State/local police | 2 | 309 | 30.9 | 30.9 | 37.6 |
| Dept. motor vehicles | 3 | 322 | 32.2 | 32.2 | 69.8 |
| Somewhere else | 4 | 151 | 15.1 | 15.1 | 84.9 |
| Combination | 5 | 87 | 8.7 | 8.7 | 93.6 |
| Dk/refused | 9 | 64 | 6.4 | 6.4 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q18 Heard traffic safety

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes, heard/read only | 1 | 103 | 10.3 | 10.3 | 10.3 |
| Yes, used and/or hea | 2 | 14 | 1.4 | 1.4 | 11.7 |
| No | 3 | 878 | 87.8 | 87.8 | 99.5 |
| Dk/refused | 9 | 5 | .5 | .5 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

Q19 Which traffic safety

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Stratford | 1 | 6 | .6 | 5.1 | 5.1 |
| UConn | 2 | 20 | 2.0 | 17.1 | 22.2 |
| Waterbury | 3 | 16 | 1.6 | 13.7 | 35.9 |
| Waterford | 4 | 10 | 1.0 | 8.5 | 44.4 |
| Somewhere else | 5 | 23 | 2.3 | 19.7 | 64.1 |
| Combination | 6 | 5 | .5 | 4.3 | 68.4 |
| Dk/refused | 9 | 37 | 3.7 | 31.6 | 100.0 |
| | 0 | 883 | 88.3 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 117 Missing cases 883

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q20 How valuable services

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Very valuable | 1 | 65 | 6.5 | 55.6 | 55.6 |
| Somewhat | 2 | 40 | 4.0 | 34.2 | 89.7 |
| Not valuable | 3 | 1 | .1 | .9 | 90.6 |
| Don't know enough | 4 | 7 | .7 | 6.0 | 96.6 |
| Dk/refused | 9 | 4 | .4 | 3.4 | 100.0 |
| | 0 | 883 | 88.3 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 117 Missing cases 883

Q21 Motorcycle operaton

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes | 1 | 75 | 7.5 | 7.5 | 7.5 |
| No | 2 | 925 | 92.5 | 92.5 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q22 Involved traffic accident

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes | 1 | 18 | 1.8 | 24.0 | 24.0 |
| No | 2 | 57 | 5.7 | 76.0 | 100.0 |
| | 0 | 925 | 92.5 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 75 Missing cases 925

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q23 Wear motorcycle helmet

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Always | 1 | 30 | 3.0 | 40.0 | 40.0 |
| Most | 2 | 12 | 1.2 | 16.0 | 56.0 |
| Sometimes | 3 | 13 | 1.3 | 17.3 | 73.3 |
| Never | 4 | 20 | 2.0 | 26.7 | 100.0 |
| | 0 | 925 | 92.5 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 75 Missing cases 925

Q24 Wear protective garments

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Always | 1 | 29 | 2.9 | 38.7 | 38.7 |
| Most | 2 | 20 | 2.0 | 26.7 | 65.3 |
| Sometimes | 3 | 23 | 2.3 | 30.7 | 96.0 |
| Never | 4 | 2 | .2 | 2.7 | 98.7 |
| Dk/refused | 9 | 1 | .1 | 1.3 | 100.0 |
| | 0 | 925 | 92.5 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 75 Missing cases 925

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q25 Take motorcycle education

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes | 1 | 27 | 2.7 | 2.7 | 2.7 |
| No | 2 | 970 | 97.0 | 97.0 | 99.7 |
| Dk/refused | 9 | 3 | .3 | .3 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q26 How valuable is program

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Very valuable | 1 | 19 | 1.9 | 70.4 | 70.4 |
| Somewhat | 2 | 6 | .6 | 22.2 | 92.6 |
| Not valuable | 3 | 2 | .2 | 7.4 | 100.0 |
| | 0 | 973 | 97.3 | Missing | |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 27 Missing cases 973

Q27 What town you live in

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| | 2 | 2 | .2 | .2 | .2 |
| | 3 | 1 | .1 | .1 | .3 |
| | 5 | 3 | .3 | .3 | .6 |
| | 6 | 1 | .1 | .1 | .7 |
| | 7 | 6 | .6 | .6 | 1.3 |
| | 8 | 2 | .2 | .2 | 1.5 |
| | 9 | 9 | .9 | .9 | 2.4 |
| | 11 | 5 | .5 | .5 | 2.9 |
| | 12 | 3 | .3 | .3 | 3.2 |
| | 13 | 1 | .1 | .1 | 3.3 |
| | 14 | 13 | 1.3 | 1.3 | 4.6 |
| | 15 | 46 | 4.6 | 4.6 | 9.2 |
| | 17 | 15 | 1.5 | 1.5 | 10.7 |
| | 18 | 3 | .3 | .3 | 11.0 |
| | 19 | 1 | .1 | .1 | 11.1 |
| | 21 | 2 | .2 | .2 | 11.3 |
| | 22 | 2 | .2 | .2 | 11.5 |
| | 23 | 3 | .3 | .3 | 11.8 |
| | 25 | 9 | .9 | .9 | 12.7 |
| | 26 | 1 | .1 | .1 | 12.8 |
| | 27 | 3 | .3 | .3 | 13.1 |
| | 28 | 8 | .8 | .8 | 13.9 |
| | 29 | 2 | .2 | .2 | 14.1 |
| | 32 | 4 | .4 | .4 | 14.5 |
| | 33 | 6 | .6 | .6 | 15.1 |
| | 34 | 13 | 1.3 | 1.3 | 16.4 |
| | 35 | 5 | .5 | .5 | 16.9 |
| | 36 | 2 | .2 | .2 | 17.1 |
| | 37 | 6 | .6 | .6 | 17.7 |
| | 38 | 4 | .4 | .4 | 18.1 |
| | 39 | 2 | .2 | .2 | 18.3 |
| | 40 | 1 | .1 | .1 | 18.4 |
| | 41 | 2 | .2 | .2 | 18.6 |
| | 42 | 15 | 1.5 | 1.5 | 20.1 |
| | 43 | 5 | .5 | .5 | 20.6 |
| | 44 | 6 | .6 | .6 | 21.2 |
| | 45 | 4 | .4 | .4 | 21.6 |
| | 47 | 2 | .2 | .2 | 21.8 |
| | 48 | 3 | .3 | .3 | 22.1 |
| | 49 | 12 | 1.2 | 1.2 | 23.3 |
| | 50 | 2 | .2 | .2 | 23.5 |
| | 51 | 9 | .9 | .9 | 24.4 |
| | 52 | 4 | .4 | .4 | 24.8 |
| | 54 | 7 | .7 | .7 | 25.5 |
| | 56 | 2 | .2 | .2 | 25.7 |
| | 57 | 20 | 2.0 | 2.0 | 27.7 |

Q27 What town you live in

| | | | | |
|---|---|---|---|---|
| 59 | 11 | 1.1 | 1.1 | 28.8 |
| 60 | 4 | .4 | .4 | 29.2 |
| 61 | 3 | .3 | .3 | 29.5 |
| 62 | 11 | 1.1 | 1.1 | 30.6 |
| 64 | 27 | 2.7 | 2.7 | 33.3 |
| 66 | 2 | .2 | .2 | 33.5 |
| 68 | 4 | .4 | .4 | 33.9 |
| 69 | 7 | .7 | .7 | 34.6 |
| 70 | 1 | .1 | .1 | 34.7 |
| 71 | 1 | .1 | .1 | 34.8 |
| 72 | 5 | .5 | .5 | 35.3 |
| 73 | 2 | .2 | .2 | 35.5 |
| 74 | 2 | .2 | .2 | 35.7 |
| 76 | 7 | .7 | .7 | 36.4 |
| 77 | 17 | 1.7 | 1.7 | 38.1 |
| 78 | 8 | .8 | .8 | 38.9 |
| 80 | 20 | 2.0 | 2.0 | 40.9 |
| 81 | 6 | .6 | .6 | 41.5 |
| 83 | 13 | 1.3 | 1.3 | 42.8 |
| 84 | 17 | 1.7 | 1.7 | 44.5 |
| 85 | 8 | .8 | .8 | 45.3 |
| 86 | 5 | .5 | .5 | 45.8 |
| 88 | 6 | .6 | .6 | 46.4 |
| 89 | 20 | 2.0 | 2.0 | 48.4 |
| 90 | 4 | .4 | .4 | 48.8 |
| 91 | 4 | .4 | .4 | 49.2 |
| 93 | 46 | 4.6 | 4.6 | 53.8 |
| 94 | 5 | .5 | .5 | 54.3 |
| 95 | 8 | .8 | .8 | 55.1 |
| 96 | 9 | .9 | .9 | 56.0 |
| 97 | 5 | .5 | .5 | 56.5 |
| 98 | 1 | .1 | .1 | 56.6 |
| 99 | 10 | 1.0 | 1.0 | 57.6 |
| 101 | 9 | .9 | .9 | 58.5 |
| 102 | 1 | .1 | .1 | 58.6 |
| 103 | 21 | 2.1 | 2.1 | 60.7 |
| 104 | 12 | 1.2 | 1.2 | 61.9 |
| 105 | 3 | .3 | .3 | 62.2 |
| 106 | 5 | .5 | .5 | 62.7 |
| 107 | 1 | .1 | .1 | 62.8 |
| 108 | 6 | .6 | .6 | 63.4 |
| 109 | 6 | .6 | .6 | 64.0 |
| 110 | 11 | 1.1 | 1.1 | 65.1 |
| 111 | 6 | .6 | .6 | 65.7 |
| 113 | 2 | .2 | .2 | 65.9 |
| 114 | 3 | .3 | .3 | 66.2 |
| 115 | 13 | 1.3 | 1.3 | 67.5 |
| 117 | 3 | .3 | .3 | 67.8 |
| 118 | 12 | 1.2 | 1.2 | 69.0 |
| 119 | 11 | 1.1 | 1.1 | 70.1 |

Q27 What town you live in

| | | | | | |
|---|---|---|---|---|---|
| | 120 | 1 | .1 | .1 | 70.2 |
| | 124 | 6 | .6 | .6 | 70.8 |
| | 126 | 7 | .7 | .7 | 71.5 |
| | 128 | 14 | 1.4 | 1.4 | 72.9 |
| | 129 | 2 | .2 | .2 | 73.1 |
| | 130 | 5 | .5 | .5 | 73.6 |
| | 131 | 4 | .4 | .4 | 74.0 |
| | 132 | 8 | .8 | .8 | 74.8 |
| | 133 | 1 | .1 | .1 | 74.9 |
| | 135 | 30 | 3.0 | 3.0 | 77.9 |
| | 136 | 3 | .3 | .3 | 78.2 |
| | 137 | 3 | .3 | .3 | 78.5 |
| | 138 | 10 | 1.0 | 1.0 | 79.5 |
| | 139 | 5 | .5 | .5 | 80.0 |
| | 140 | 4 | .4 | .4 | 80.4 |
| | 141 | 3 | .3 | .3 | 80.7 |
| | 142 | 7 | .7 | .7 | 81.4 |
| | 143 | 11 | 1.1 | 1.1 | 82.5 |
| | 144 | 13 | 1.3 | 1.3 | 83.8 |
| | 146 | 9 | .9 | .9 | 84.7 |
| | 147 | 1 | .1 | .1 | 84.8 |
| | 148 | 10 | 1.0 | 1.0 | 85.8 |
| | 151 | 29 | 2.9 | 2.9 | 88.7 |
| | 152 | 12 | 1.2 | 1.2 | 89.9 |
| | 153 | 2 | .2 | .2 | 90.1 |
| | 154 | 12 | 1.2 | 1.2 | 91.3 |
| | 155 | 11 | 1.1 | 1.1 | 92.4 |
| | 156 | 1 | .1 | .1 | 92.5 |
| | 157 | 2 | .2 | .2 | 92.7 |
| | 158 | 7 | .7 | .7 | 93.4 |
| | 159 | 15 | 1.5 | 1.5 | 94.9 |
| | 160 | 5 | .5 | .5 | 95.4 |
| | 161 | 7 | .7 | .7 | 96.1 |
| | 162 | 6 | .6 | .6 | 96.7 |
| | 163 | 9 | .9 | .9 | 97.6 |
| | 164 | 10 | 1.0 | 1.0 | 98.6 |
| | 165 | 5 | .5 | .5 | 99.1 |
| | 167 | 3 | .3 | .3 | 99.4 |
| | 168 | 4 | .4 | .4 | 99.8 |
| Dk/refused | 999 | 2 | .2 | .2 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

Q28 Age

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| 1900 or earlier | 0 | 1 | .1 | .1 | .1 |
| | 7 | 1 | .1 | .1 | .2 |
| | 8 | 3 | .3 | .3 | .5 |
| | 9 | 3 | .3 | .3 | .8 |
| | 10 | 1 | .1 | .1 | .9 |
| | 11 | 3 | .3 | .3 | 1.2 |
| | 12 | 1 | .1 | .1 | 1.3 |
| | 13 | 2 | .2 | .2 | 1.5 |
| | 14 | 5 | .5 | .5 | 2.0 |
| | 15 | 6 | .6 | .6 | 2.6 |
| | 16 | 4 | .4 | .4 | 3.0 |
| | 17 | 6 | .6 | .6 | 3.6 |
| | 18 | 8 | .8 | .8 | 4.4 |
| | 19 | 5 | .5 | .5 | 4.9 |
| | 20 | 10 | 1.0 | 1.0 | 5.9 |
| | 21 | 11 | 1.1 | 1.1 | 7.0 |
| | 22 | 10 | 1.0 | 1.0 | 8.0 |
| | 23 | 6 | .6 | .6 | 8.6 |
| | 24 | 8 | .8 | .8 | 9.4 |
| | 25 | 11 | 1.1 | 1.1 | 10.5 |
| | 26 | 13 | 1.3 | 1.3 | 11.8 |
| | 27 | 12 | 1.2 | 1.2 | 13.0 |
| | 28 | 4 | .4 | .4 | 13.4 |
| | 29 | 13 | 1.3 | 1.3 | 14.7 |
| | 30 | 15 | 1.5 | 1.5 | 16.2 |
| | 31 | 15 | 1.5 | 1.5 | 17.7 |
| | 32 | 14 | 1.4 | 1.4 | 19.1 |
| | 33 | 10 | 1.0 | 1.0 | 20.1 |
| | 34 | 4 | .4 | .4 | 20.5 |
| | 35 | 10 | 1.0 | 1.0 | 21.5 |
| | 36 | 8 | .8 | .8 | 22.3 |
| | 37 | 10 | 1.0 | 1.0 | 23.3 |
| | 38 | 13 | 1.3 | 1.3 | 24.6 |
| | 39 | 14 | 1.4 | 1.4 | 26.0 |
| | 40 | 4 | .4 | .4 | 26.4 |
| | 41 | 11 | 1.1 | 1.1 | 27.5 |
| | 42 | 19 | 1.9 | 1.9 | 29.4 |
| | 43 | 19 | 1.9 | 1.9 | 31.3 |
| | 44 | 13 | 1.3 | 1.3 | 32.6 |
| | 45 | 15 | 1.5 | 1.5 | 34.1 |
| | 46 | 21 | 2.1 | 2.1 | 36.2 |
| | 47 | 22 | 2.2 | 2.2 | 38.4 |
| | 48 | 23 | 2.3 | 2.3 | 40.7 |
| | 49 | 19 | 1.9 | 1.9 | 42.6 |
| | 50 | 19 | 1.9 | 1.9 | 44.5 |
| | 51 | 15 | 1.5 | 1.5 | 46.0 |

Q28 Age

| | | | | |
|---|---|---|---|---|
| 52 | 24 | 2.4 | 2.4 | 48.4 |
| 53 | 25 | 2.5 | 2.5 | 50.9 |
| 54 | 29 | 2.9 | 2.9 | 53.8 |
| 55 | 20 | 2.0 | 2.0 | 55.8 |
| 56 | 24 | 2.4 | 2.4 | 58.2 |
| 57 | 25 | 2.5 | 2.5 | 60.7 |
| 58 | 18 | 1.8 | 1.8 | 62.5 |
| 59 | 29 | 2.9 | 2.9 | 65.4 |
| 60 | 22 | 2.2 | 2.2 | 67.6 |
| 61 | 17 | 1.7 | 1.7 | 69.3 |
| 62 | 29 | 2.9 | 2.9 | 72.2 |
| 63 | 23 | 2.3 | 2.3 | 74.5 |
| 64 | 22 | 2.2 | 2.2 | 76.7 |
| 65 | 23 | 2.3 | 2.3 | 79.0 |
| 66 | 16 | 1.6 | 1.6 | 80.6 |
| 67 | 19 | 1.9 | 1.9 | 82.5 |
| 68 | 18 | 1.8 | 1.8 | 84.3 |
| 69 | 21 | 2.1 | 2.1 | 86.4 |
| 70 | 24 | 2.4 | 2.4 | 88.8 |
| 71 | 16 | 1.6 | 1.6 | 90.4 |
| 72 | 17 | 1.7 | 1.7 | 92.1 |
| 73 | 8 | .8 | .8 | 92.9 |
| 74 | 12 | 1.2 | 1.2 | 94.1 |
| 75 | 8 | .8 | .8 | 94.9 |
| 76 | 16 | 1.6 | 1.6 | 96.5 |
| 77 | 12 | 1.2 | 1.2 | 97.7 |
| 78 | 3 | .3 | .3 | 98.0 |
| 99 | 20 | 2.0 | 2.0 | 100.0 |
| Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

Q29 Race

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| White | 1 | 832 | 83.2 | 83.2 | 83.2 |
| Black | 2 | 62 | 6.2 | 6.2 | 89.4 |
| Hispanic | 3 | 48 | 4.8 | 4.8 | 94.2 |
| Something else | 4 | 35 | 3.5 | 3.5 | 97.7 |
| Dk/refused | 9 | 23 | 2.3 | 2.3 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

Q30 Total family income

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Less than 10,000 dol | 1 | 51 | 5.1 | 5.1 | 5.1 |
| $10,000 up to 15,000 | 2 | 58 | 5.8 | 5.8 | 10.9 |
| $15,000 up to 20,000 | 3 | 48 | 4.8 | 4.8 | 15.7 |
| $20,000 up to 30,000 | 4 | 122 | 12.2 | 12.2 | 27.9 |
| $30,00 up to 50,000 | 5 | 205 | 20.5 | 20.5 | 48.4 |
| $50,000 up to 75,000 | 6 | 165 | 16.5 | 16.5 | 64.9 |
| Over $75,000 | 7 | 151 | 15.1 | 15.1 | 80.0 |
| Dk/refused | 9 | 200 | 20.0 | 20.0 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

SELECT selection

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| | 1 | 508 | 50.8 | 50.8 | 50.8 |
| | 2 | 492 | 49.2 | 49.2 | 100.0 |
| | Total | 1000 | 100.0 | 100.0 | |

Valid cases 1000 Missing cases 0

## APPENDIX C - ACCIDENT STATISTICS

Accident rates (acc/operator)

No. CONREP Graduates: 9,320 No. Accidents: 39 Acc. Rate = 0.0042

Total operators: 51,000 Total Accidents: 9320 Acc. Rate = 0.0196

Note: Rate for graduates is significantly (@ 95%) less than general population.
Also, rate for graduates is significantly (@ 95%) less than for non-graduates.

Accidents by severity

INJ_CAT Page 1 of 1

| GRADUATE | Count | A | B | C | N | Row Total |
|---|---|---|---|---|---|---|
| | 70 | 208 | 307 | 140 | 129 | 854 |
| | | | | | | 95.6 |
| Y | 4 | 8 | 7 | 10 | 10 | 39 |
| | | | | | | 4.4 |
| Column Total | 74 | 216 | 314 | 150 | 139 | 893 |
| | 8.3 | 24.2 | 35.2 | 16.8 | 15.6 | 100.0 |

| Chi-Square | Value | DF | Significance |
|---|---|---|---|
| Pearson | 8.41378 | 4 | .07754 |
| Likelihood Ratio | 8.46504 | 4 | .07595 |

Minimum Expected Frequency - 3.232
Cells with Expected Frequency < 5 - 1 OF 10 ( 10.0%)

| Statistic | Value | ASE1 | Val/ASE0 | Approximate Significance |
|---|---|---|---|---|
| Contingency Coefficient | .09661 | | | .07754 *1 |

*1 Pearson chi-square probability

Number of Missing Observations: 0

Thus, with 90 % confidence, graduates have less severe accidents.

## Responsibility for Accident

RESP Page 1 of 1

| GRADUATE | Count | N | Y | Row Total |
|---|---|---|---|---|
| | 126 | 354 | 374 | 854 |
| | | | | 95.6 |
| Y | 7 | 21 | 11 | 39 |
| | | | | 4.4 |
| Column Total | 133 | 375 | 385 | 893 |
| | 14.9 | 42.0 | 43.1 | 100.0 |

| Chi-Square | Value | DF | Significance |
|---|---|---|---|
| Pearson | 3.72218 | 2 | .15550 |
| Likelihood Ratio | 3.88156 | 2 | .14359 |

Minimum Expected Frequency - 5.809

| Statistic | Value | ASE1 | Val/ASE0 | Approximate Significance |
|---|---|---|---|---|
| Contingency Coefficient | .06443 | | | .15550 *1 |

*1 Pearson chi-square probability

Number of Missing Observations: 0

Thus, it cannot be concluded that graduates are less responsible for accidents than non-graduates.

## Helmet Usage

HELMET Page 1 of 1

| GRADUATE | Count | N | Y | Row Total |
|---|---|---|---|---|
| | 71 | 588 | 195 | 854 |
| | | | | 95.6 |
| Y | 4 | 24 | 11 | 39 |
| | | | | 4.4 |
| Column Total | 75 | 612 | 206 | 893 |
| | 8.4 | 68.5 | 23.1 | 100.0 |

| Chi-Square | Value | DF | Significance |
|---|---|---|---|
| Pearson | .92518 | 2 | .62965 |
| Likelihood Ratio | .89473 | 2 | .63931 |

Minimum Expected Frequency - 3.275
Cells with Expected Frequency < 5 - 1 OF 6 ( 16.7%)

| Statistic | Value | ASE1 | Val/ASE0 | Approximate Significance |
|---|---|---|---|---|
| Contingency Coefficient | .03217 | | | .62965 *1 |

*1 Pearson chi-square probability

Number of Missing Observations: 0

Thus, it cannot be concluded that helmet usage is greater amongst graduates. However, since the sample of graduates was from those who have had accidents, it is reasonable to conclude that they may not have the same attitudes as graduates in general.

## APPENDIX D - CONREP SURVEY

Q01. Where was your rider course?

| | | |
|---|---|---|
| ( ) Farmington | ( ) Stratford | ( ) Enfield |
| ( ) Waterbury | ( ) Norwich | ( ) East Granby |
| ( ) Storrs | ( ) Middletown | |

Q02. Are you currently a licensed motorcycle operator?

(1) Yes
(2) No

| | (Yes) Excellent | | Good | | (No) Poor |
|---|---|---|---|---|---|
| Q03. How effective was your instructor in explaining the course? | 1 | 2 | 3 | 4 | 5 |
| Q04. Rate the skills you have learned from the course? | | | | | |
| Physical skills: | | | | | |
| (a) Turning | 1 | 2 | 3 | 4 | 5 |
| (b) Shifting | 1 | 2 | 3 | 4 | 5 |
| (c) Stopping | 1 | 2 | 3 | 4 | 5 |
| (d) Swerving / Obstacle avoidance | 1 | 2 | 3 | 4 | 5 |
| (e) Quick Stops | 1 | 2 | 3 | 4 | 5 |
| Mental Skills: | | | | | |
| (f) Scanning / Looking | 1 | 2 | 3 | 4 | 5 |
| (g) Identifying Hazards | 1 | 2 | 3 | 4 | 5 |
| (h) Predicting Hazards | 1 | 2 | 3 | 4 | 5 |
| (i) Avoiding Hazards | 1 | 2 | 3 | 4 | 5 |
| (j) Reaction to surprise hazards | 1 | 2 | 3 | 4 | 5 |
| Q05. Do you feel that your abilities improved after taking the rider course? | 1 | 2 | 3 | 4 | 5 |
| Q06. Overall, how well did this course meet your expectations? | 1 | 2 | 3 | 4 | 5 |
| Q07. Were the materials covered in the coursed helpful to you? (Rating) | 1 | 2 | 3 | 4 | 5 |
| Q08. Did the format of the course help your learning process? | 1 | 2 | 3 | 4 | 5 |

Q09. What changes would you like to see in the rider course?

_____

Q10. What subject(s) do you think the course did not cover that would benefit you?

_____

Q11. Please provide any additional comments, questions or recommendations about the CONREP program.

Q12. When operating a motorcycle do you wear your helmet - always, most of the time, sometimes, or never?

(1) Always
(2) Most
(3) Sometimes
(4) Never
(9) Refused

Q13. When operating an automobile do you wear your seatbelt - always, most of the time, sometimes, or never?

(1) Always
(2) Most
(3) Sometimes
(4) Never
(9) Refused

Q14. Have you ever consumed alcohol before driving a motorcycle?

(1) Yes
(2) No
(9) Refused

Q15. How long have you been riding a motorcycle?

(1) Less than one year
(2) 1 year
(3) 2 years
(4) 3 years
(5) 4 years or more

Q16. Approximately how many miles have you driven you motorcycle within the past year?

Q17. For what purpose do you ride?

(1) Recreational
(2) Work
(3) School
(4) Other
(9) Refused

Q18. Did you get a motorcycle license endorsement?

(1) After the course
(2) Before the course
(3) Not at all
(4) No intention Why?

Q19. When operating your motorcycle, have you received any traffic violations within the past 12 months?

(1) Yes
(2) No
(9) Refused

Q20. Have you been involved in any motorcycle accidents within the past 12 months?

(1) Low speed fall
(2) Loss of control
(3) Sliding on gravel or wet pavement
(4) Collision with another vehicle
(5) Other
(6) Never
(9) Refused

Q21. Were you injured or hospitalized as a result of this accident?

(1) Injured, not hospitalized
(2) Hospitalized
(3) Not injured
(9) Refused

Q22. If involved with another vehicle, was the accident your fault?

(1) Yes
(2) No
(3) Refused

Q23. What make of motorcycle do you own?

Q24. What is the engine size of your motorcycle? (cc's)

# APPENDIX E - CONREP SURVEY RESULTS

LOCATION Location of rider course

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Farmington | 1 | 12 | 12.0 | 12.0 | 12.0 |
| Stratford | 2 | 18 | 18.0 | 18.0 | 30.0 |
| Enfield | 3 | 29 | 29.0 | 29.0 | 59.0 |
| Waterbury | 4 | 14 | 14.0 | 14.0 | 73.0 |
| Norwich | 5 | 10 | 10.0 | 10.0 | 83.0 |
| East Granby | 6 | 7 | 7.0 | 7.0 | 90.0 |
| Storrs | 7 | 4 | 4.0 | 4.0 | 94.0 |
| Middletown | 8 | 6 | 6.0 | 6.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100 Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

LICENSED Licensed motorcycle operator?

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| yes | 1 | 93 | 93.0 | 93.0 | 93.0 |
| no | 2 | 7 | 7.0 | 7.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100 Missing cases 0

INSTRUCT  Rate the instructor

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Excellent | 1 | 81 | 81.0 | 81.0 | 81.0 |
| | 2 | 16 | 16.0 | 16.0 | 97.0 |
| Good | 3 | 3 | 3.0 | 3.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

TURNING  Rate the turning skills

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Excellent | 1 | 64 | 64.0 | 64.0 | 64.0 |
| | 2 | 31 | 31.0 | 31.0 | 95.0 |
| Good | 3 | 5 | 5.0 | 5.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

SHIFTING  Rate the shifting skills

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Excellent | 1 | 63 | 63.0 | 63.0 | 63.0 |
| | 2 | 28 | 28.0 | 28.0 | 91.0 |
| Good | 3 | 8 | 8.0 | 8.0 | 99.0 |
| Poor | 5 | 1 | 1.0 | 1.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

STOPPING  Rate the stopping skills

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Excellent | 1 | 74 | 74.0 | 74.0 | 74.0 |
| | 2 | 25 | 25.0 | 25.0 | 99.0 |
| Good | 3 | 1 | 1.0 | 1.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

SWERVING  Rate the swerving / obstacle avoidance s

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Excellent | 1 | 72 | 72.0 | 72.0 | 72.0 |
| | 2 | 25 | 25.0 | 25.0 | 97.0 |
| Good | 3 | 3 | 3.0 | 3.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

QCK_STOP  Rate the quick stop skills

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Excellent | 1 | 73 | 73.0 | 73.0 | 73.0 |
| | 2 | 24 | 24.0 | 24.0 | 97.0 |
| Good | 3 | 3 | 3.0 | 3.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

SCANNING  Rate the scanning / looking skills

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Excellent | 1 | 72 | 72.0 | 72.0 | 72.0 |
| | 2 | 25 | 25.0 | 25.0 | 97.0 |
| Good | 3 | 3 | 3.0 | 3.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

ID_HAZRD  Rate the identifying hazards skills

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Excellent | 1 | 66 | 66.0 | 66.0 | 66.0 |
| | 2 | 25 | 25.0 | 25.0 | 91.0 |
| Good | 3 | 9 | 9.0 | 9.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

PRED_HZD  Rate the predicting hazards skills

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Excellent | 1 | 67 | 67.0 | 67.0 | 67.0 |
| | 2 | 24 | 24.0 | 24.0 | 91.0 |
| Good | 3 | 9 | 9.0 | 9.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

AVOID_HZ  Rate the avoiding hazards skills

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Excellent | 1 | 67 | 67.0 | 67.0 | 67.0 |
| | 2 | 29 | 29.0 | 29.0 | 96.0 |
| Good | 3 | 4 | 4.0 | 4.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

REACTION  Rate the reaction to surprise hazards sk

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Excellent | 1 | 65 | 65.0 | 65.0 | 65.0 |
| | 2 | 30 | 30.0 | 30.0 | 95.0 |
| Good | 3 | 5 | 5.0 | 5.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

ABILITY  Do you feel that your abilities improved

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes | 1 | 100 | 100.0 | 100.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

EXPECT  Did the course meet your expectations

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes | 1 | 100 | 100.0 | 100.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

MATERIAL  Were the materials covered in the course

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Excellent | 1 | 61 | 61.0 | 61.0 | 61.0 |
| | 2 | 37 | 37.0 | 37.0 | 98.0 |
| Good | 3 | 2 | 2.0 | 2.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

FORMAT  Did the format of the course help your l

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Yes | 1 | 99 | 99.0 | 99.0 | 99.0 |
| No | 5 | 1 | 1.0 | 1.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100  Missing cases 0

HELMET  Do you wear a helmet?

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Always | 1 | 62 | 62.0 | 66.7 | 66.7 |
| Most of the time | 2 | 10 | 10.0 | 10.8 | 77.4 |
| Sometimes | 3 | 14 | 14.0 | 15.1 | 92.5 |
| Never | 4 | 7 | 7.0 | 7.5 | 100.0 |
| | . | 7 | 7.0 | Missing | |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 93  Missing cases 7

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

SEATBELT  Do you wear a seatbelt?

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Always | 1 | 50 | 50.0 | 53.8 | 53.8 |
| Most of the time | 2 | 24 | 24.0 | 25.8 | 79.6 |
| Sometimes | 3 | 15 | 15.0 | 16.1 | 95.7 |
| Never | 4 | 4 | 4.0 | 4.3 | 100.0 |
| | . | 7 | 7.0 | Missing | |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 93  Missing cases 7

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

ALCOHOL  Consume alcohol before driving a m/c?

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| yes | 1 | 2 | 2.0 | 2.2 | 2.2 |
| no | 2 | 89 | 89.0 | 97.8 | 100.0 |
| | . | 9 | 9.0 | Missing | |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 91  Missing cases 9

EXPRNC  Years riding a motorcycle

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Less than a year | 1 | 13 | 13.0 | 14.3 | 14.3 |
| 1 year | 2 | 23 | 23.0 | 25.3 | 39.6 |
| 2 years | 3 | 25 | 25.0 | 27.5 | 67.0 |
| 3 years | 4 | 7 | 7.0 | 7.7 | 74.7 |
| 4 years or more | 5 | 23 | 23.0 | 25.3 | 100.0 |
| | . | 9 | 9.0 | Missing | |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 91  Missing cases 9

MILES miles driven on m/c within past year

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| | 0 | 3 | 3.0 | 3.3 | 3.3 |
| | 50 | 2 | 2.0 | 2.2 | 5.4 |
| | 100 | 8 | 8.0 | 8.7 | 14.1 |
| | 150 | 2 | 2.0 | 2.2 | 16.3 |
| | 200 | 9 | 9.0 | 9.8 | 26.1 |
| | 250 | 5 | 5.0 | 5.4 | 31.5 |
| | 300 | 1 | 1.0 | 1.1 | 32.6 |
| | 400 | 2 | 2.0 | 2.2 | 34.8 |
| | 450 | 1 | 1.0 | 1.1 | 35.9 |
| | 500 | 7 | 7.0 | 7.6 | 43.5 |
| | 600 | 2 | 2.0 | 2.2 | 45.7 |
| | 700 | 1 | 1.0 | 1.1 | 46.7 |
| | 750 | 3 | 3.0 | 3.3 | 50.0 |
| | 800 | 1 | 1.0 | 1.1 | 51.1 |
| | 1000 | 8 | 8.0 | 8.7 | 59.8 |
| | 1100 | 1 | 1.0 | 1.1 | 60.9 |
| | 1200 | 2 | 2.0 | 2.2 | 63.0 |
| | 1500 | 3 | 3.0 | 3.3 | 66.3 |
| | 2000 | 6 | 6.0 | 6.5 | 72.8 |
| | 2100 | 1 | 1.0 | 1.1 | 73.9 |
| | 2500 | 1 | 1.0 | 1.1 | 75.0 |
| | 2750 | 1 | 1.0 | 1.1 | 76.1 |
| | 3000 | 5 | 5.0 | 5.4 | 81.5 |
| | 3500 | 3 | 3.0 | 3.3 | 84.8 |
| | 4000 | 2 | 2.0 | 2.2 | 87.0 |
| | 5000 | 4 | 4.0 | 4.3 | 91.3 |
| | 6000 | 1 | 1.0 | 1.1 | 92.4 |
| | 7000 | 1 | 1.0 | 1.1 | 93.5 |
| | 8000 | 3 | 3.0 | 3.3 | 96.7 |
| | 10000 | 1 | 1.0 | 1.1 | 97.8 |
| | 15000 | 1 | 1.0 | 1.1 | 98.9 |
| | 20000 | 1 | 1.0 | 1.1 | 100.0 |
| | . | 8 | 8.0 | Missing | |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 92 Missing cases 8

PURPOSE  purpose for riding

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Recreational | 1 | 75 | 75.0 | 83.3 | 83.3 |
| Work | 2 | 1 | 1.0 | 1.1 | 84.4 |
| School | 3 | 1 | 1.0 | 1.1 | 85.6 |
| Combination | 4 | 13 | 13.0 | 14.4 | 100.0 |
| | . | 10 | 10.0 | Missing | |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 90  Missing cases 10

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

ENDORSE  have a motorcycle license endorsement?

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Before the course | 1 | 83 | 83.0 | 92.2 | 92.2 |
| After the course | 2 | 6 | 6.0 | 6.7 | 98.9 |
| Not at all | 3 | 1 | 1.0 | 1.1 | 100.0 |
| | . | 10 | 10.0 | Missing | |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 90  Missing cases 10

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

VIOLATNS  Traffic violation within the past year?

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| No | 2 | 89 | 89.0 | 100.0 | 100.0 |
| | . | 11 | 11.0 | Missing | |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 89  Missing cases 11

ACCIDNTS Accidents within the past year

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| Sliding on gravel or | 3 | 1 | 1.0 | 1.1 | 1.1 |
| Collision with anoth | 4 | 3 | 3.0 | 3.4 | 4.5 |
| Never | 6 | 85 | 85.0 | 95.5 | 100.0 |
| | . | 11 | 11.0 | Missing | |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 89 Missing cases 11

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

INJURY Injury due to accident?

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| | 0 | 1 | 1.0 | 1.1 | 1.1 |
| Injured, not hospita | 1 | 3 | 3.0 | 3.4 | 4.5 |
| Hospitalized | 2 | 1 | 1.0 | 1.1 | 5.6 |
| | 9 | 84 | 84.0 | 94.4 | 100.0 |
| | . | 11 | 11.0 | Missing | |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 89 Missing cases 11

- - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - - -

FAULT Was accident m/c operators fault

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| | 0 | 1 | 1.0 | 1.1 | 1.1 |
| Yes | 1 | 1 | 1.0 | 1.1 | 2.2 |
| No | 2 | 3 | 3.0 | 3.4 | 5.6 |
| | 9 | 84 | 84.0 | 94.4 | 100.0 |
| | . | 11 | 11.0 | Missing | |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 89 Missing cases 11

TYPE Type of motorcycle owned?

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| | | 4 | 4.0 | 4.0 | 4.0 |
| | BMW | 4 | 4.0 | 4.0 | 8.0 |
| | Dukati? | 1 | 1.0 | 1.0 | 9.0 |
| | Harley D | 26 | 26.0 | 26.0 | 35.0 |
| | Honda | 24 | 24.0 | 24.0 | 59.0 |
| | Hurrican | 1 | 1.0 | 1.0 | 60.0 |
| | Katana | 1 | 1.0 | 1.0 | 61.0 |
| | Kawasaki | 8 | 8.0 | 8.0 | 69.0 |
| | Suzuki | 10 | 10.0 | 10.0 | 79.0 |
| | Vespa | 1 | 1.0 | 1.0 | 80.0 |
| | Yamaha | 9 | 9.0 | 9.0 | 89.0 |
| | none | 11 | 11.0 | 11.0 | 100.0 |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 100 Missing cases 0

ENGINE Engine size of motorcycle (cc's)

| Value Label | Value | Frequency | Percent | Valid Percent | Cum Percent |
|---|---|---|---|---|---|
| | 100 | 1 | 1.0 | 1.2 | 1.2 |
| | 200 | 1 | 1.0 | 1.2 | 2.4 |
| | 250 | 5 | 5.0 | 6.0 | 8.4 |
| | 400 | 3 | 3.0 | 3.6 | 12.0 |
| | 450 | 3 | 3.0 | 3.6 | 15.7 |
| | 500 | 11 | 11.0 | 13.3 | 28.9 |
| | 550 | 2 | 2.0 | 2.4 | 31.3 |
| | 600 | 4 | 4.0 | 4.8 | 36.1 |
| | 650 | 4 | 4.0 | 4.8 | 41.0 |
| | 700 | 3 | 3.0 | 3.6 | 44.6 |
| | 750 | 8 | 8.0 | 9.6 | 54.2 |
| | 800 | 4 | 4.0 | 4.8 | 59.0 |
| | 880 | 1 | 1.0 | 1.2 | 60.2 |
| | 883 | 9 | 9.0 | 10.8 | 71.1 |
| | 900 | 1 | 1.0 | 1.2 | 72.3 |
| | 980 | 1 | 1.0 | 1.2 | 73.5 |
| | 1000 | 2 | 2.0 | 2.4 | 75.9 |
| | 1100 | 6 | 6.0 | 7.2 | 83.1 |
| | 1200 | 7 | 7.0 | 8.4 | 91.6 |
| | 1300 | 1 | 1.0 | 1.2 | 92.8 |
| | 1340 | 5 | 5.0 | 6.0 | 98.8 |
| | 1380 | 1 | 1.0 | 1.2 | 100.0 |
| | . | 17 | 17.0 | Missing | |
| | Total | 100 | 100.0 | 100.0 | |

Valid cases 83 Missing cases 17