Highway Safety Improvement Program

Data Driven Decisions

South Carolina
Highway Safety Improvement Program
2016 Annual Report

Prepared by: SC

Disclaimer

Protection of Data from Discovery & Admission into Evidence

23 U.S.C. 148(h)(4) states "Notwithstanding any other provision of law, reports, surveys, schedules, lists, or data compiled or collected for any purpose relating to this section [HSIP], shall not be subject to discovery or admitted into evidence in a Federal or State court proceeding or considered for other purposes in any action for damages arising from any occurrence at a location identified or addressed in the reports, surveys, schedules, lists, or other data."

23 U.S.C. 409 states "Notwithstanding any other provision of law, reports, surveys, schedules, lists, or data compiled or collected for the purpose of identifying, evaluating, or planning the safety enhancement of potential accident sites, hazardous roadway conditions, or railway-highway crossings, pursuant to sections 130, 144, and 148 of this title or for the purpose of developing any highway safety construction improvement project which may be implemented utilizing Federal-aid highway funds shall not be subject to discovery or admitted into evidence in a Federal or State court proceeding or considered for other purposes in any action for damages arising from any occurrence at a location mentioned or addressed in such reports, surveys, schedules, lists, or data."

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Executive Summary

This report provides an overview of SCDOT's administration of the Highway Safety Improvement Program (HSIP). SCDOT's HSIP has a primary focus on state-maintained roads since nearly 96 percent of fatal crashes and the vast majority of severe crashes occur on the state system. This report covers funding obligations from January 1, 2015 to December 31, 2015.

Introduction

The Highway Safety Improvement Program (HSIP) is a core Federal-aid program with the purpose of achieving a significant reduction in fatalities and serious injuries on all public roads. As per 23 U.S.C. 148(h) and 23 CFR 924.15, States are required to report annually on the progress being made to advance HSIP implementation and evaluation efforts. The format of this report is consistent with the HSIP MAP-21 Reporting Guidance dated February 13, 2013 and consists of four sections: program structure, progress in implementing HSIP projects, progress in achieving safety performance targets, and assessment of the effectiveness of the improvements.

Program Structure

Program Administration

How are Highway Safety Improvement Program funds allocated in a State?

Central

Describe how local roads are addressed as part of Highway Safety Improvement Program.

In South Carolina, the vast majority (~96%) of fatal crashes occur on state-maintained roadways. Due to this statistic, our primary focus for safety has been on state-maintained roadways. However, we have recently planned for some intersection improvement projects where a local road intersects with a state-owned road. Additionally, as our crash data is improving in accessibility and completeness, we will incorporate local roads into our safety funding if a viable need is observed.

It is also worth noting that South Carolina maintains the fourth largest highway system in the nation at nearly 41,400 center-line miles of roadway, despite a land area of roughly 32,000 square

miles. Furthermore, 19% of all public roads in the nation are state maintained while South Carolina's public roads encompass 54% of its total roadway miles.

Identify which internal partners are involved with Highway Safety Improvement Program planning.

Design
Planning
Maintenance
Operations

Briefly describe coordination with internal partners.

Several partners within SCDOT and consultants are involved thoughout the process of HSIP planning. Many of our safety improvements are designed by our Safety Project group within Traffic Engineering and they are involved with project design or oversight on all projects to ensure proper designs. Our Planning office is consulted during the selection process to determine if any qualifying projects have been identified for improvements through other funding sources such as the Metropolitan Planning Organizations (MPOs) or Council of Governments (COGs). Our Maintenance office is also contacted to ensure that there are no conflicting maintenance activities such as resurfacing or pavement marking contracts that involve overlapping work. Operations are monitored through other Traffic Engineering offices or consultants to ensure that all projects include consideration of proper traffic operations by conducting traffic volume counts, Synchro analysis, signal operations, etc.

Identify which external partners are involved with Highway Safety Improvement Program planning.

Metropolitan Planning Organizations
Governors Highway Safety Office
Local Government Association

Identify any program administration practices used to implement the HSIP that have changed since the last reporting period.

Other-No changes have been made since the last reporting period

Describe any other aspects of Highway Safety Improvement Program Administration on which you would like to elaborate.

Highway Safety Improvement Program Process

Every state is required by the federal government to administer a Highway Safety Improvement Program (HSIP). Part 924 of Title 23 of the Code of Federal Regulations (CFR) states, in part:

924.5 Policy. *"Each state shall develop and implement, on a continuing basis, a highway safety improvement program which has the overall objective of reducing the number and severity of accidents and decreasing the potential for accidents on all highways."*

924.7 Program Structure. *"The highway safety improvement program in each state shall consist of components for planning, implementation, and evaluation of safety programs and projects."*

The purpose of the South Carolina HSIP is to establish guidelines for the effective use of available funds, to reduce the number and severity of crashes and to decrease the potential for crashes on highways in the state.

The program consists of the following three components: planning, implementation, and evaluation.

1. PLANNING

a. Data Management

In order to locate hazardous locations the following information is essential:

- Crash data – Crash reports are provided by ***DPS***.
- Traffic data – Traffic volumes are provided by the ***Traffic Engineering***.
- Roadway Data – Road characteristics are provided by the ***Traffic Engineering***.

b. Identify Hazardous Locations

Using the information listed above, potential locations are identified by:

- Recommendations from SCDOT and FHWA personnel.
- Requests from governmental units other than SCDOT and FHWA.
- Requests from citizens.
- Ongoing research of all fatal crash reports received from DPS.
- Ongoing research of the HSIP database.

The HSIP database has been established to identify, prioritize, and provide guidance for selecting potential projects. The information gathered for a location is analyzed using the following methods:

- Crash Rate – Equates frequency of crashes to traffic volumes (and length of roadway if section). A typical crash rate would be expressed in # of crashes per million vehicles entering (if intersection) or per one hundred million vehicle miles of travel (if section).

Severity Rate – A weighted calculation for determining the severity of the crashes. It is based on the EPDO (Equivalent Property Damage Only) method from studies performed by the National Safety Council and the Traffic Institute at Northwestern University. The severity indices used are listed below: (from the Traffic Institute at Northwestern University)

Fatality = 12

Injury = 3

Property Damage Only = 1

- Rate Quality

This method entails the calculation of the crash rate at each location and a statistical test to determine if that rate is significantly higher than crash rates for other locations with similar characteristics.

The critical rate is compared to the actual crash rate for each location. If the actual crash rate exceeds the critical rate, then the location may be considered for improvement.

- Number-Rate

Combines crash frequency and crash rate methods by first ranking by the number of crashes. Establishes a frequency threshold and then re-ranks the locations. Based on a crash rate threshold, locations with lower crash rates are eliminated.

c. Conduct Engineering Studies

Once a potential project location has been identified, the following steps are taken to determine if geometric improvements can be implemented that will reduce the volume and severity of the crashes reported at the location.

- Analyze Project Location

Crash reports are obtained and analyzed for locations selected for detailed review. Results from analyses along with engineering judgment are used to determine if further investigation is needed along with site review.

- Develop Candidate Countermeasures and Project Proposals

Site reviews are conducted to determine characteristics of locations relative to types of crashes occurring. Improvements are recommended to address patterns in crashes.

- Establish Project Priorities

Estimate costs for recommended improvements at each site along with expected reduction in crashes for these improvements. Summarize estimated costs and benefits for improvements and determine the most cost effective improvement alternative for a location using the ***Net Benefit Method*** along with engineering judgment.

The ***net benefit method*** compares the estimated annual costs of implementing the selected countermeasure to the expected annual benefits. The expected annual benefit is calculated using the most current "***comprehensive costs***" of motor vehicle traffic crashes and the estimated crash reduction percentage expected as a result of implementing the selected countermeasure.

Comprehensive costs are a measure of motor vehicle accident costs that include the effects of injury on people's entire lives. This is the most useful measure of accident cost since it includes all cost components and places a dollar value on each one. Comprehensive life values are estimated by examining risk reduction costs from which the market value of safety is inferred. The 11 components of the comprehensive cost are: property damage, lost earnings, lost household production, medical costs, emergency services, travel delay, vocational rehabilitation, workplace costs, administrative, legal, pain, and lost quality of life.

2. IMPLEMENTATION

Given that the overall charge of the HSIP program is to reduce the number and severity of crashes, it is imperative that the implementation phase be carried out in a timely manner. Once the project has been approved for funding, it is necessary to design and schedule the project to implement the improvements. All HSIP Projects are managed by one of the following offices:

- Preconstruction
- Traffic Engineering
- Consultant

Given the appropriate conditions, *a Participation Agreement* may be arranged with other governmental entities. A participation agreement is a contractual partnership between the SCDOT and one or more other governmental entities where funding is combined to complete a project. The agreement includes the specifying of the roles, responsibilities, and financial obligations of each participant.

3. EVALUATION

To Determine the Effect of Highway Safety Improvements

Before and After Studies are conducted on all HSIP projects to evaluate the effectiveness of the overall program by observed changes in crash number, rate and severity resulting from program

implementation. The HSIP office conducts studies three years after final inspection of a project. The studies include:

- Photographs of existing conditions at the site prior to improvements.
- After a period of no less than 3 years after the completion of the project, crash data and the most recent traffic volumes are collected for the location.
- The data collected *before* implementing safety improvements is then compared with the data collected *after* the improvements have been completed.
- The information described above is used to calculate the resulting crash rate reduction factor for the improved site. The total cost of the project along with the reduction factor is used to conduct a *Benefit Cost Analysis* to determine the overall effectiveness of the project.
- Photographs of the improved conditions are recorded along with all *Benefit Cost Analysis.* This information is used to help with the selection of future projects.

Program Methodology

Select the programs that are administered under the HSIP.

Other-Safety Program

Program: **Other-Safety Program**
Date of Program Methodology: **10/1/2015**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic	Median width
Fatal crashes only	Volume	
Fatal and serious injury crashes only	Lane miles	Functional classification

What project identification methodology was used for this program?

Crash frequency
Equivalent property damage only (EPDO Crash frequency)
Relative severity index
Crash rate
Critical rate
Excess expected crash frequency using SPFs

Are local roads (non-state owned and operated) included or addressed in this program?

Yes
If yes, are local road projects identified using the same methodology as state roads?
Yes

How are highway safety improvement projects advanced for implementation?
selection committee

Select the processes used to prioritize projects for implementation. For the methods selected, indicate the relative importance of each process in project prioritization. Enter either the weights or numerical rankings. If weights are entered, the sum must equal 100. If ranks are entered, indicate ties by giving both processes the same rank and skip the next highest rank (as an example: 1, 2, 2, 4).
Rank of Priority Consideration

Ranking based on B/C	3
Available funding	2
Ranking based on net benefit	3
Cost Effectiveness	1

What proportion of highway safety improvement program funds address systemic improvements?

30%

Highway safety improvement program funds are used to address which of the following systemic improvements?

Rumble Strips
Pavement/Shoulder Widening
Safety Edge
Add/Upgrade/Modify/Remove Traffic Signal

What process is used to identify potential countermeasures?

Engineering Study
Road Safety Assessment

Identify any program methodology practices used to implement the HSIP that have changed since the last reporting period.

Other-Local roads are considered on limited basis, based on available data.

Describe any other aspects of the Highway Safety Improvement Program methodology on which you would like to elaborate.

Projects selected for the HSIP have historically been based on one of the following analysis methods:

1. Crash Rate Method

2. Rate Quality Control Method

3. Crash Severity Method

4. Number Rate Method

In addition to these methods, the Highway Safety Manual provides additional statistical methods and safety performance functions that are also being incorporated in the selection process. All of the HSIP projects are selected under the framework of the SCDOT Strategic Highway Safety Plan (SHSP) where "Safety" is identified as a top priority for the agency. SCDOT released an update to the SHSP in early 2015, which covers the performance period from 2015 to 2018 and includes updated performance goals and emphasis areas based on Moving Ahead for Progress in the 21st Century (MAP-21) requirements. SCDOT has adopted the Target Zero initiative as the State's main goal in addressing traffic-related deaths.

HSIP projects are developed in collaboration with the following emphasis areas identified in the 2015 SHSP which are:

1. Roadway Departure

2. Unrestrained Motor Vehicle Occupants

3. Age-Related

4. Speed-Related

5. Vulnerable Roadway Users

6. Intersection and Other High-Risk Roadway Locations

7. Impaired Driving

8. Commercial Motor Vehicles/ Heavy Trucks

9. Distracted Driving

10. Safety Data Collection, Access, and Analysis

Progress in Implementing Projects

Funds Programmed

Reporting period for Highway Safety Improvement Program funding.

Calendar Year

Enter the programmed and obligated funding for each applicable funding category.

Funding Category	Programmed*		Obligated	
HSIP (Section 148)	$100,618,218.01	45 %	$54,415,280.13	31 %
HRRRP (SAFETEA-LU)	$205,806.58	0 %	$205,806.58	0 %
Penalty Transfer – Section 164	$13,714,674.76	6 %	$13,714,674.76	8 %
Other Federal-aid Funds (i.e. STP, NHPP)	$2,977,909.58	1 %	$2,545,415.73	1 %
State and Local Funds	$107,444,018.03	48 %	$104,287,387.24	60 %
Totals	$224,960,626.96	100%	$175,168,564.44	100%

How much funding is programmed to local (non-state owned and operated) safety projects?
$0.00
How much funding is obligated to local safety projects?
$0.00

How much funding is programmed to non-infrastructure safety projects?
$5,250,619.00
How much funding is obligated to non-infrastructure safety projects?
$5,160,619.00

How much funding was transferred in to the HSIP from other core program areas during the reporting period?
$14,600,000.00
How much funding was transferred out of the HSIP to other core program areas during the reporting period?
$2,000,000.00

Discuss impediments to obligating Highway Safety Improvement Program funds and plans to overcome this in the future.

Describe any other aspects of the general Highway Safety Improvement Program implementation progress on which you would like to elaborate.

The state and local funding provided is higher than previous years due to partnering with a state infrastructure bank (SIB) project. Additionally, for this year the programmed and obligated funding amounts include advanced construction (AC). AC is used in lieu of an actual obligation as a promise to FHWA to commit to the actual obligation at a later time. This funding will be converted into a real obligation once expenditures are accrued to the project.

Identification of local roads for safety improvements is hindered by the availability of data. At this time not all locals have been mapped in our system and are therefore not considered during the project identification phase. SCDOT is working toward mapping all local roads. A completion date for this project has not been established.

General Listing of Projects

List each highway safety improvement project obligated during the reporting period.

Project	Improvement Category	Output	HSIP Cost	Total Cost	Funding Category	Functional Classification	AADT	Speed	Roadway Ownership	Relationship to SHSP	
										Emphasis Area	Strategy
Target Zero Media Campaign MOA-1-15	Non-infrastructure Educational efforts	1 Numbers	1200000	1200000	Penalty Transfer - Section 154		0	0	State Highway Agency	Education	
Target Zero Campaign TRA-1-15	Non-infrastructure Enforcement	1 Numbers	2000000	2000000	Penalty Transfer - Section 154		0	0	State Highway Agency	Enforcement	Provide targeted enforcement with an empahsis on
S-179 (E McIver Road)	Shoulder treatments Shoulder treatments - other	2.93 Miles	403206.26	403206.26	Penalty Transfer - Section 154	Rural Major Collector	6400	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-13 (E National Cemetery Rd)	Shoulder treatments Shoulder treatments - other	9.87 Miles	858066.33	858066.33	Penalty Transfer - Section 154	Rural Major Collector	2139	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro

S-627 (Pleasant View Dr/ Redmond Rd/ Fal	Shoulder treatments Shoulder treatments - other	6.34 Miles	1032399.74	1032399.74	Penalty Transfer - Section 154	Rural Major Collector	646	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-60 (Wire Rd)	Shoulder treatments Shoulder treatments - other	2.88 Miles	558196.03	558196.03	Penalty Transfer - Section 154		3500	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
2015 Rumble Stripes District 4	Roadway Rumble strips - edge or shoulder	265.02 Miles	3110895.27	3110895.27	Penalty Transfer - Section 154		0	0	State Highway Agency	Roadway Departure	Deploy centerline and edge line rumbles in accorda
2015 Rumble Stripes District 3	Roadway Rumble strips - edge or shoulder	127.37 Miles	1140248.05	1140248.05	Penalty Transfer - Section 154		0	0	State Highway Agency	Roadway Departure	Deploy centerline and edge line rumbles in accorda
2015 Rumble Stripes District 2	Roadway Rumble strips - edge or shoulder	197.75 Miles	3411662.78	3411662.78	Penalty Transfer - Section 154		0	0	State Highway Agency	Roadway Departure	Deploy centerline and edge line rumbles in accorda
S-146 Widening	Shoulder treatments Shoulder treatments -	1 Miles	18000	20000	HRRRP (SAFETEA-LU)	Rural Local Road or Street	1680	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade

	other										shoulders to pro
S-272 SAFETY IMPROVEMENT	Shoulder treatments Shoulder treatments - other	4.06 Miles	8506.95	9452.17	HRRRP (SAFETEA-LU)	Rural Major Collector	1400	0	State Highway Agency	Roadway Departure	
S- 24 WIDENING	Shoulder treatments Shoulder treatments - other	2.15 Miles	4500	5000	HRRRP (SAFETEA-LU)	Rural Major Collector	700	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
SC 462 WIDENING RESURFACE	Shoulder treatments Shoulder treatments - other	35.7 Miles	194221.86	174799.63	HRRRP (SAFETEA-LU)	Rural Minor Arterial	3226	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-112 (N. Ebenezer Rd/Pisgah Rd) at S-193 (N. Eben	Intersection geometry Intersection geometrics - modify skew angle	1 Numbers	180000	200000	HSIP (Section 148)	Urban Minor Collector	14250	0	State Highway Agency	Intersections	Identify high-crash intersections and evaluate for
D2 Low Cost Safety Improvements	Intersection traffic control Systemic improvements - signal-controlled	1 Numbers	97187.97	97187.97	HSIP (Section 148)		0	0	State Highway Agency	Intersections	
D3 Low Cost	Intersection	1	380537.8	380537.8	HSIP		0	0	State	Intersectio	

Safety Improvements	traffic control Systemic improvements - signal-controlled	Numbers	1	1	(Section 148)				Highway Agency	ns	
Signalize and construct left turn lanes on S-204 (	Intersection traffic control Intersection traffic control - other	1 Numbers	81000	90000	HSIP (Section 148)	Urban Minor Collector	15950	0	State Highway Agency	Intersections	
Median Improvements (US 21 @ SC 170; SC 170 @ S-76	Access management Median crossover - unspecified	1 Numbers	45000	50000	HSIP (Section 148)	Urban Principal Arterial - Other	21900	0	State Highway Agency	Intersections	
2015 HFSC Project	Roadway Pavement surface - high friction surface	1 Numbers	150306.26	167006.95	HSIP (Section 148)		0	0	State Highway Agency	Roadway Departure	
Richland I-77 Feasibility Study	Non-infrastructure Transportation safety planning	1 Numbers	45000	50000	HSIP (Section 148)	Rural Principal Arterial - Interstate	0	0	State Highway Agency	Corridor Study	
SC 153 Feasibility Study	Non-infrastructure Transportation safety	1 Numbers	45000	50000	HSIP (Section 148)	Urban Minor Arterial	0	0	State Highway Agency	Corridor Study	

	planning										
S-29 (Riverside Rd)	Shoulder treatments Shoulder treatments - other	10.01 Miles	4224941.63	4694379.59	HSIP (Section 148)	Rural Major Collector	3300	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-347 (John Everall Rd)	Shoulder treatments Shoulder treatments - other	3.05 Miles	761922.77	846580.77	HSIP (Section 148)	Rural Major Collector	1100	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
Statewide Section/Corridor Improvements - S-187 (B	Shoulder treatments Shoulder treatments - other	3.47 Miles	1032865.58	1147628.42	HSIP (Section 148)	Rural Major Collector	750	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-196 (Harrison Grove Rd)	Shoulder treatments Shoulder treatments - other	3.31 Miles	1114302.75	1238114.17	HSIP (Section 148)	Rural Local Road or Street	2040	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-105 (Mayo Rd)	Shoulder treatments Shoulder treatments - other	3.76 Miles	691408.08	768231.2	HSIP (Section 148)	Rural Major Collector	850	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
SC 418 (Fountain Inn	Shoulder treatments	3.34 Miles	691649.26	768499.18	HSIP (Section	Rural Major	750	0	State Highway	Roadway Departure	Identify opportuniti

Rd)	Shoulder treatments - other				148)	Collector			Agency		es to upgrade shoulders to pro
Statewide Section/Corridor Improvements - Moorefie	Shoulder treatments Shoulder treatments - other	16.34 Miles	3186967.47	3541074.97	HSIP (Section 148)	Rural Major Collector	2800	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
SC 186 (Dacusville Rd)	Shoulder treatments Shoulder treatments - other	4.36 Miles	308318.38	342575.98	HSIP (Section 148)	Rural Major Collector	1100	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-25 (Old Manning Rd)	Shoulder treatments Shoulder treatments - other	5.57 Miles	737069.69	737069.69	HSIP (Section 148)	Rural Major Collector	2700	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-458 (Cains Mill Rd)	Shoulder treatments Shoulder treatments - other	4.4 Miles	548272.31	548272.31	HSIP (Section 148)	Rural Major Collector	2800	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-528 (Kolb Rd)	Shoulder treatments Shoulder treatments - other	2.44 Miles	602919.46	602919.46	HSIP (Section 148)	Urban Major Collector	2100	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro

S-1058 (Kirkwood Rd)	Shoulder treatments Shoulder treatments - other	1.23 Miles	337300.54	374778.38	HSIP (Section 148)	Urban Local Road or Street	638	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-955 (Kelly Mill Rd)	Shoulder treatments Shoulder treatments - other	3.87 Miles	212729.35	236365.94	HSIP (Section 148)	Urban Major Collector	3178	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
Statewide Section/Corridor Improvements - S-51 (Am	Shoulder treatments Shoulder treatments - other	6.48 Miles	288971.33	321079.25	HSIP (Section 148)	Rural Major Collector	6980	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-647 (Gator Rd)	Shoulder treatments Shoulder treatments - other	2.64 Miles	202136.11	224595.68	HSIP (Section 148)	Urban Major Collector	1680	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-415 (Church St)	Shoulder treatments Shoulder treatments - other	1.71 Miles	73879.23	82088.03	HSIP (Section 148)	Urban Local Road or Street	1500	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-47 (White Pond Road/ Porter Cross Road	Shoulder treatments Shoulder treatments -	3.9 Miles	686580.71	762867.45	HSIP (Section 148)	Rural Major Collector	687	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade

	other										shoulders to pro
S-485 (Three and Twenty Rd/ St Paul Rd)	Shoulder treatments Shoulder treatments - other	6.34 Miles	1743991.05	1937767.84	HSIP (Section 148)	Rural Major Collector	1500	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
S-63 (Alpine Rd) & S-1026 (Old Percival Rd)	Intersection traffic control Modify control - two-way stop to roundabout	1 Numbers	70195.79	77995.32	HSIP (Section 148)	Urban Minor Arterial	14613	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
SC 9 at Foster Rd	Intersection traffic control Modify control - two-way stop to roundabout	1 Numbers	45000	50000	HSIP (Section 148)	Rural Minor Collector	8400	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
US 76 @ S-618	Intersection geometry Intersection geometry - other	1 Numbers	24120	26800	HSIP (Section 148)	Urban Major Collector	22950	0	State Highway Agency	Intersections	Identify high-crash intersections and evaluate for
SC 6 @ S-627	Intersection geometry Auxiliary lanes - add	1 Numbers	67500	75000	HSIP (Section 148)	Rural Major Collector	0	0	State Highway Agency	Intersections	Identify high-crash intersections and

	left-turn lane										evaluate for
2015 Rumble Stripes District 7	Roadway Rumble strips - edge or shoulder	191.79 Miles	715492.96	715492.96	HSIP (Section 148)		0	0	State Highway Agency	Roadway Departure	Deploy centerline and edge line rumbles in accorda
2015 Rumble Stripes District 6	Roadway Rumble strips - edge or shoulder	128.37 Miles	2983416.56	2983416.56	HSIP (Section 148)		0	0	State Highway Agency	Roadway Departure	Deploy centerline and edge line rumbles in accorda
2015 Rumble Stripes District 5	Roadway Rumble strips - edge or shoulder	128.17 Miles	460684.83	460684.83	HSIP (Section 148)		0	0	State Highway Agency	Roadway Departure	Deploy centerline and edge line rumbles in accorda
2015 Rumble Stripes District 4	Roadway Rumble strips - edge or shoulder	265.02 Miles	3367966.56	3367966.56	HSIP (Section 148)		0	0	State Highway Agency	Roadway Departure	Deploy centerline and edge line rumbles in accorda
2015 Rumble Stripes District 3	Roadway Rumble strips - edge or shoulder	127.37 Miles	876017.75	876017.75	HSIP (Section 148)		0	0	State Highway Agency	Roadway Departure	Deploy centerline and edge line rumbles in accorda
2015 Rumble	Roadway	216.86	520773.6	520773.6	HSIP		0	0	State	Roadway	Deploy

Stripes District 1	Rumble strips - edge or shoulder	Miles	8	8	(Section 148)				Highway Agency	Departure	centerline and edge line rumbles in accorda
SC9/S-664	Intersection geometry Intersection geometry - other	1 Numbers	729260.04	810288.93	HSIP (Section 148)	Rural Principal Arterial - Other	5150	0	State Highway Agency	Intersections	Identify opportunities to upgrade shoulders to pro
SC 9/ Flag Patch Road	Intersection geometry Intersection geometry - other	1 Numbers	784894.29	872104.76	HSIP (Section 148)	Rural Principal Arterial - Other	5550	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
SC 34 Safety Section Widening Project	Shoulder treatments Shoulder treatments - other	1 Numbers	80658.96	89621.06	HSIP (Section 148)	Rural Minor Arterial	4900	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
I-20 (US 378 to Long Pond Road)	Roadway Roadway widening - add lane(s) along segment	11.1 Miles	450000	500000	HSIP (Section 148)	Urban Principal Arterial - Interstate	53665	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
US 21 @ S-499	Intersection geometry Intersection geometrics - modify skew	1 Numbers	1108228.73	1231365.26	HSIP (Section 148)	Rural Major Collector	5400	0	State Highway Agency	Intersections	Identify high-crash intersections and evaluate

	angle										for
SC 261 OTHER	Access management Raised island - install new	1 Numbers	176154.01	195726.67	HSIP (Section 148)	Rural Minor Collector	5420	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
S-25/S-522 Intersection Improvement	Intersection traffic control Modify control - two-way stop to roundabout	1 Numbers	242989.69	242989.69	HSIP (Section 148)	Urban Major Collector	9400	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
S-82 INTERSEC. IMPROVEMENT	Intersection traffic control Modify control - two-way stop to roundabout	1 Numbers	45000	45000	HSIP (Section 148)	Urban Major Collector	10544	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
US 501 INTERSEC. IMPROVEMENT	Intersection geometry Auxiliary lanes - modify left-turn lane offset	1 Numbers	552591.12	613990.14	HSIP (Section 148)	Urban Principal Arterial - Other	23050	0	State Highway Agency	Intersections	Identify high-crash intersections and evaluate for
Rumble Stripes - Dist. 2 2014	Roadway Rumble strips - edge	311.03 Miles	2926710.8	2926710.8	HSIP (Section 148)		0	0	State Highway Agency	Roadway Departure	Identify opportunities to

	or shoulder										upgrade shoulders to pro
Rumble Stripes - Dist. 1 2014	Roadway Rumble strips - edge or shoulder	79.28 Miles	986899.2	986899.2	HSIP (Section 148)		0	0	State Highway Agency	Roadway Departure	Identify opportunities to upgrade shoulders to pro
SC 101 @ S-135 INTERSEC. IMPROVEMENTS	Intersection traffic control Modify control - two-way stop to roundabout	1 Numbers	124000	124000	HSIP (Section 148)	Urban Major Collector	6850	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
SC 146 @ SC 417	Intersection traffic control Modify control - two-way stop to roundabout	1 Numbers	172700	172700	HSIP (Section 148)	Urban Minor Collector	20600	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
SC 146 @ SC 417	Intersection traffic control Intersection traffic control - other	1 Numbers	54000	54000	HSIP (Section 148)		0	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
SC 9 @ S-420	Intersection geometry	1 Numbe	832805.6	925339.55	HSIP (Section	Rural Principal	6000	0	State Highway	Intersections	Utilize innovative

	Intersection geometry - other	rs			148)	Arterial - Other			Agency		design techniques , such as roun
S- 70 INTERSEC. IMPROVEMENTS	Intersection geometry Intersection geometrics - modify skew angle	1 Numbers	687481.43	763868.25	HSIP (Section 148)	Urban Major Collector	9800	0	State Highway Agency	Intersections	Identify high-crash intersections and evaluate for
S-106/S-387/S-1065	Intersection traffic control Modify control - two-way stop to roundabout	1 Numbers	1128478.72	1128478.72	HSIP (Section 148)	Urban Major Collector	10057	0	State Highway Agency	Intersections	Utilize innovative design techniques , such as roun
US 21/S-52 Intersection Improvement	Intersection traffic control Intersection traffic control - other	1 Numbers	385548.69	428387.43	HSIP (Section 148)	Urban Minor Arterial	14900	0	State Highway Agency	Intersections	(1)Install LED signalized heads and reflective bac
SC 38 INTERSEC. IMPROVEMENTS	Intersection traffic control Modify control - two-way stop to roundabout	1 Numbers	303943.73	303943.73	HSIP (Section 148)	Urban Minor Arterial	7100	0	State Highway Agency	Intersections	Utilize innovative design techniques , such as roun

SC 6/S-624 INTERSEC. IMPROVEMENTS	Intersection geometry Intersection geometry - other	1 Numbers	388803.67	432004.07	HSIP (Section 148)	Rural Major Collector	6750	0	State Highway Agency	Intersections	Identify high-crash intersections and evaluate for
SC 118/S-105 INTERSEC. IMPROVEMENTS	Intersection geometry Auxiliary lanes - add left-turn lane	1 Numbers	259472.24	288302.49	HSIP (Section 148)	Urban Principal Arterial - Other	9450	0	State Highway Agency	Intersections	Identify high-crash intersections and evaluate for
SC 24 @ SC 59	Intersection geometry Intersection geometrics - modify skew angle	1 Numbers	1200084.23	1333426.93	HSIP (Section 148)	Rural Minor Arterial	7500	0	State Highway Agency	Intersections	Identify high-crash intersections and evaluate for
S-87 at S-488	Intersection traffic control Modify control - two-way stop to roundabout	1 Numbers	255841.06	255841.06	HSIP (Section 148)	Rural Minor Arterial	7570	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
S- 65/S-663/S-1471	Intersection traffic control Intersection traffic control - other	1 Numbers	1431536.66	1431536.66	HSIP (Section 148)	Rural Major Collector	2532	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun

I- 85 INTERSEC. IMPROVEMENT	Intersection geometry Intersection geometrics - modify skew angle	0	207396.73	230440.81	HSIP (Section 148)	Rural Principal Arterial - Interstate	28675	0	State Highway Agency	Intersections	Identify high-crash intersections and evaluate for
I-26 at US 601	Interchange design Interchange design - other	0.5 Miles	870572.94	967303.26	HSIP (Section 148)	Rural Principal Arterial - Interstate	51000	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
SC 38 at S-329	Intersection traffic control Modify control - two-way stop to roundabout	1 Numbers	1601852.46	1601852.46	HSIP (Section 148)	Urban Minor Arterial	6188	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
SC 151 Bus @ S-10, S-102, & S-1040 Intersection Im	Intersection traffic control Modify control - two-way stop to roundabout	1 Numbers	173700	173700	HSIP (Section 148)	Urban Minor Arterial	14500	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
S-28 (Camp Rd) With S-53 (Riverland)	Intersection traffic control Intersection traffic control -	1 Numbers	52400	52400	HSIP (Section 148)	Urban Major Collector	9850	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun

	other										
S-529 at S-1216	Intersection traffic control Intersection traffic control - other	1 Numbers	98771.7	109746.33	HSIP (Section 148)	Urban Principal Arterial - Other	14725	0	State Highway Agency	Intersections	(1)Install LED signalized heads and reflective bac
Singleton Ridge Road at Technology Park - Conway	Intersection traffic control Modify control - two-way stop to roundabout	1 Numbers	126000	140000	HSIP (Section 148)	Urban Minor Arterial	10300	0	State Highway Agency	Intersections	Utilize innovative design techniques, such as roun
S- 30 INTERSEC. IMPROVEMENT	Intersection traffic control Intersection traffic control - other	1 Numbers	168135.38	186817.09	HSIP (Section 148)	Urban Major Collector	10200	0	State Highway Agency	Intersections	(1)Install LED signalized heads and reflective bac

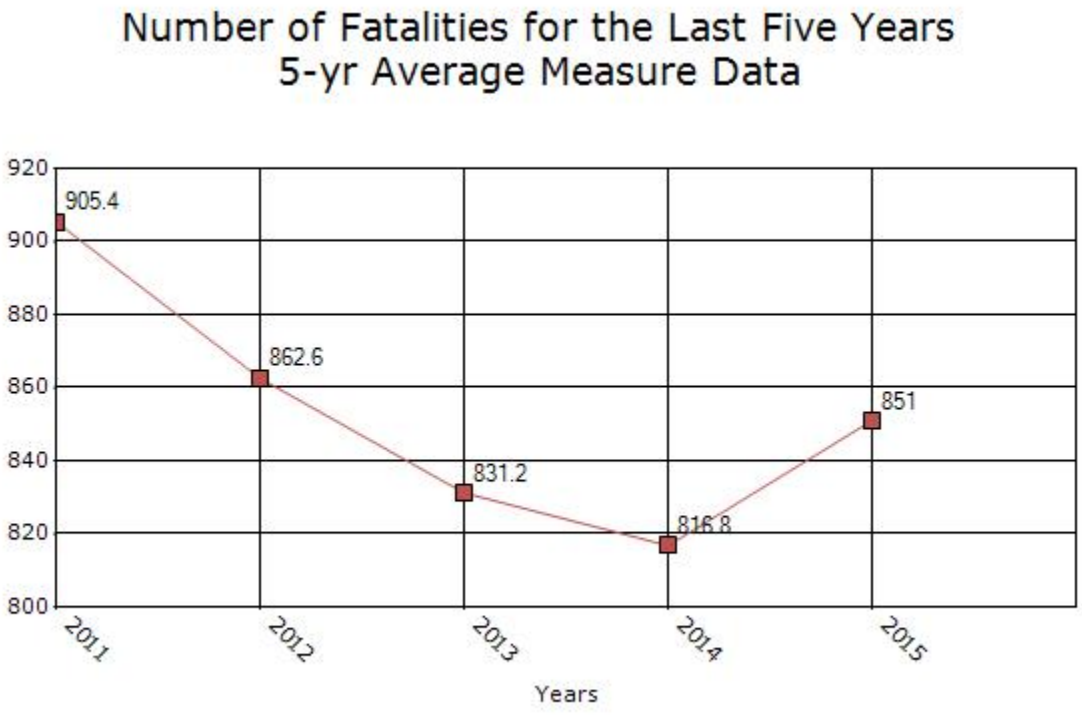
Progress in Achieving Safety Performance Targets

Overview of General Safety Trends

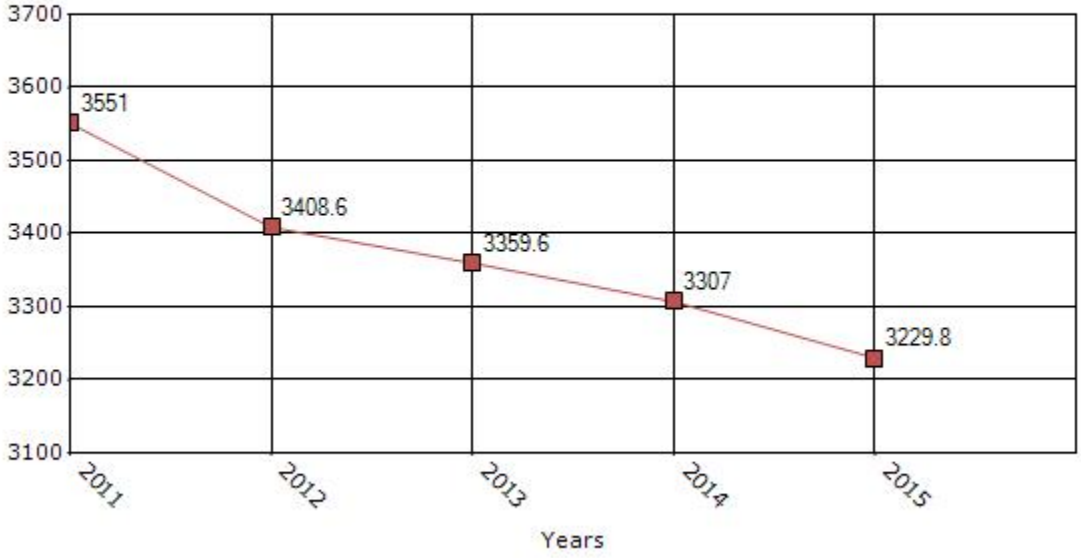
Present data showing the general highway safety trends in the state for the past five years.

Performance Measures*	2011	2012	2013	2014	2015
Number of fatalities	905.4	862.6	831.2	816.8	851
Number of serious injuries	3551	3408.6	3359.6	3307	3229.8
Fatality rate (per HMVMT)	1.84	1.76	1.7	1.66	1.71
Serious injury rate (per HMVMT)	7.21	6.97	6.87	6.73	6.51

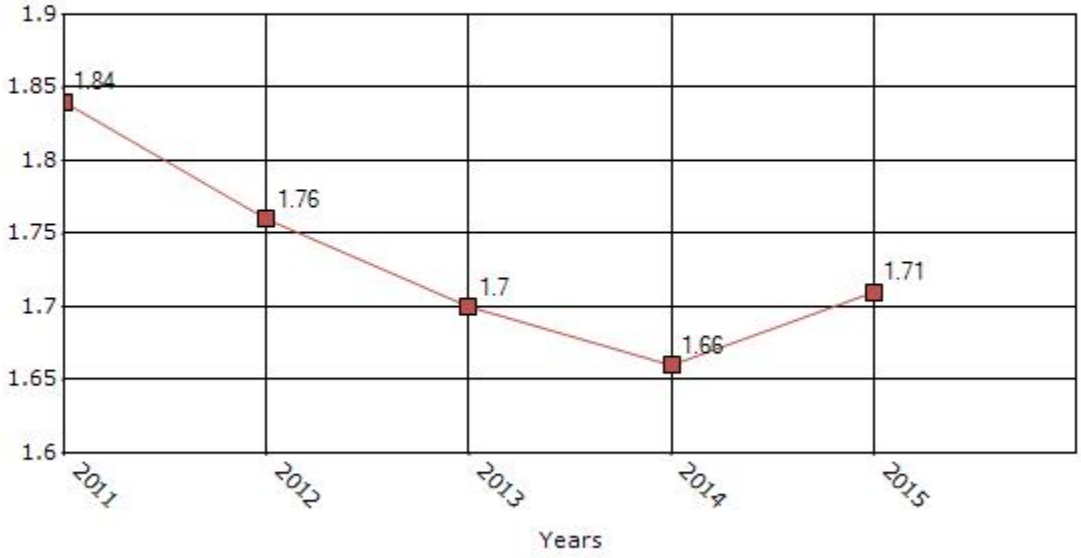
*Performance measure data is presented using a five-year rolling average.

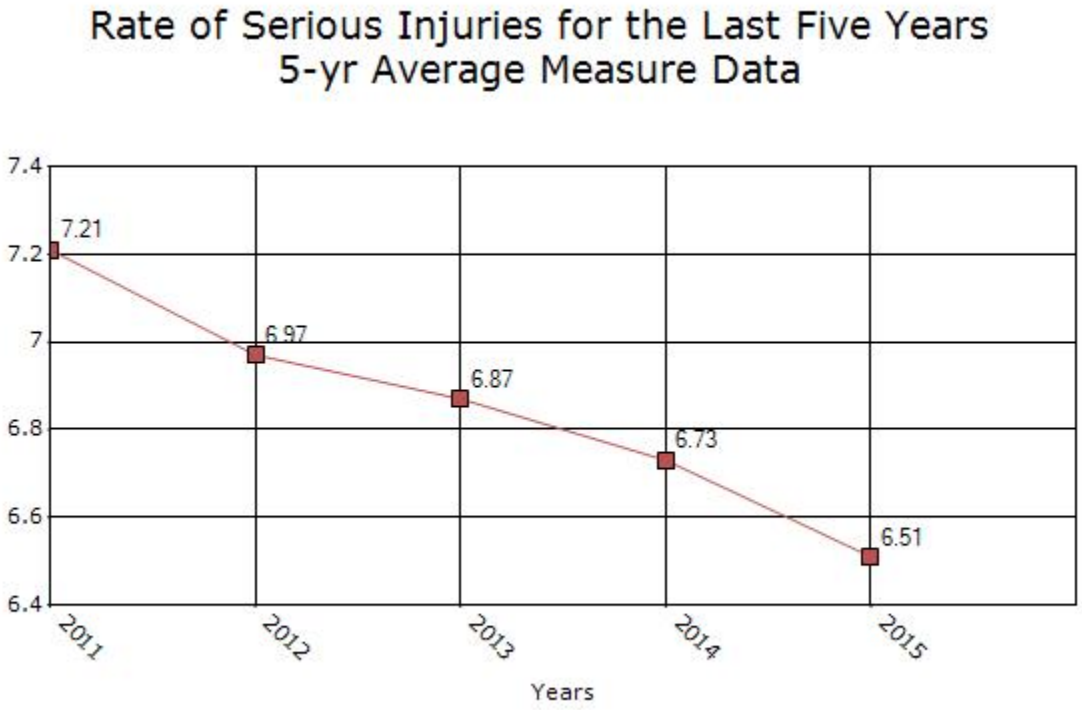


Number of Serious Injuries for the Last Five Years
5-yr Average Measure Data



Rate of Fatalities for the Last Five Years
5-yr Average Measure Data





Present data showing the general highway safety trends in the state for the past five years.

Performance Measures*	**3551**	**3408.6**	**3359.6**	**3307**	**3229.8**
Number of fatalities					
Number of serious injuries					
Fatality rate (per HMVMT)					
Serious injury rate (per HMVMT)					

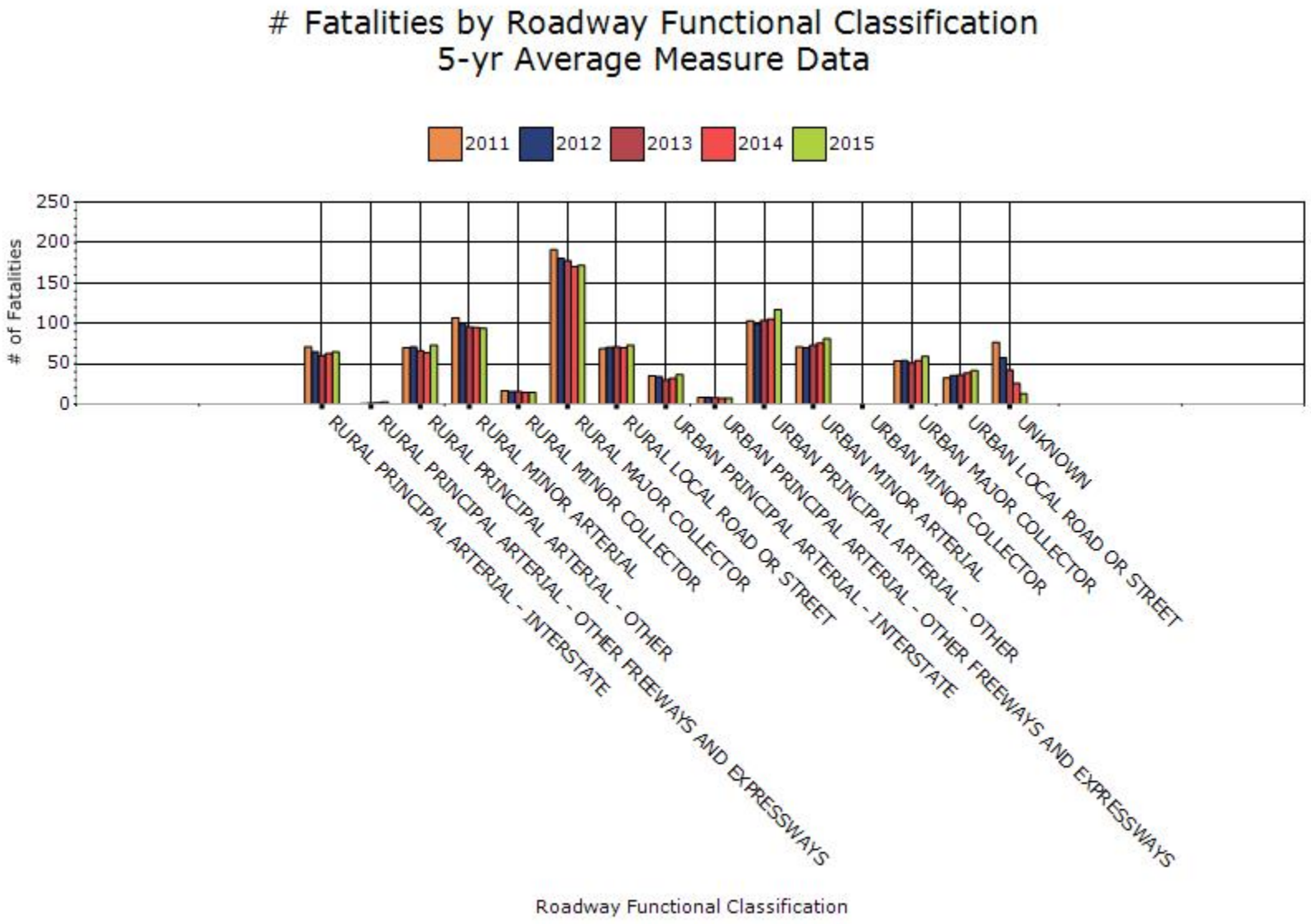
*Performance measure data is presented using a five-year rolling average.

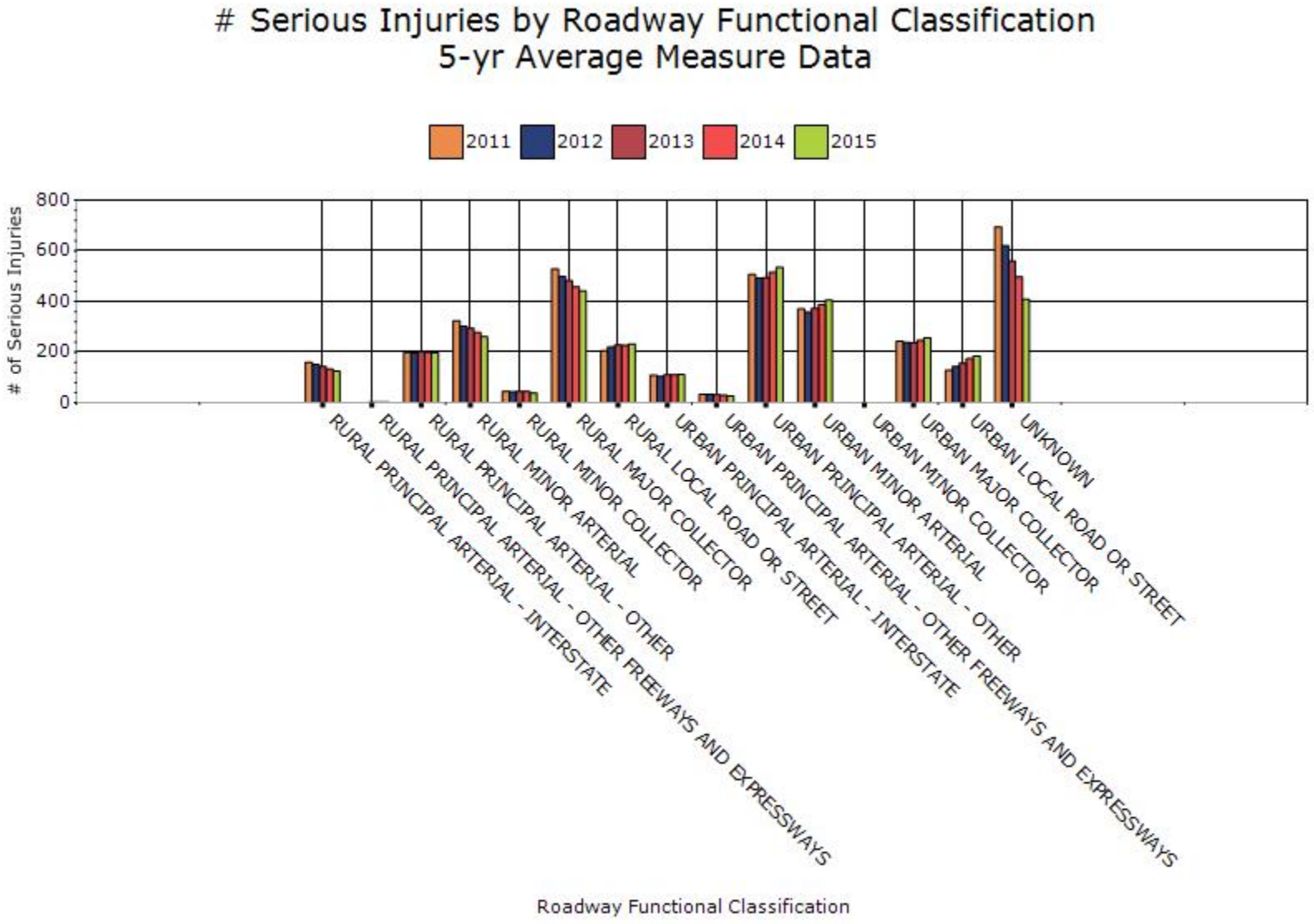
To the maximum extent possible, present performance measure* data by functional classification and ownership.

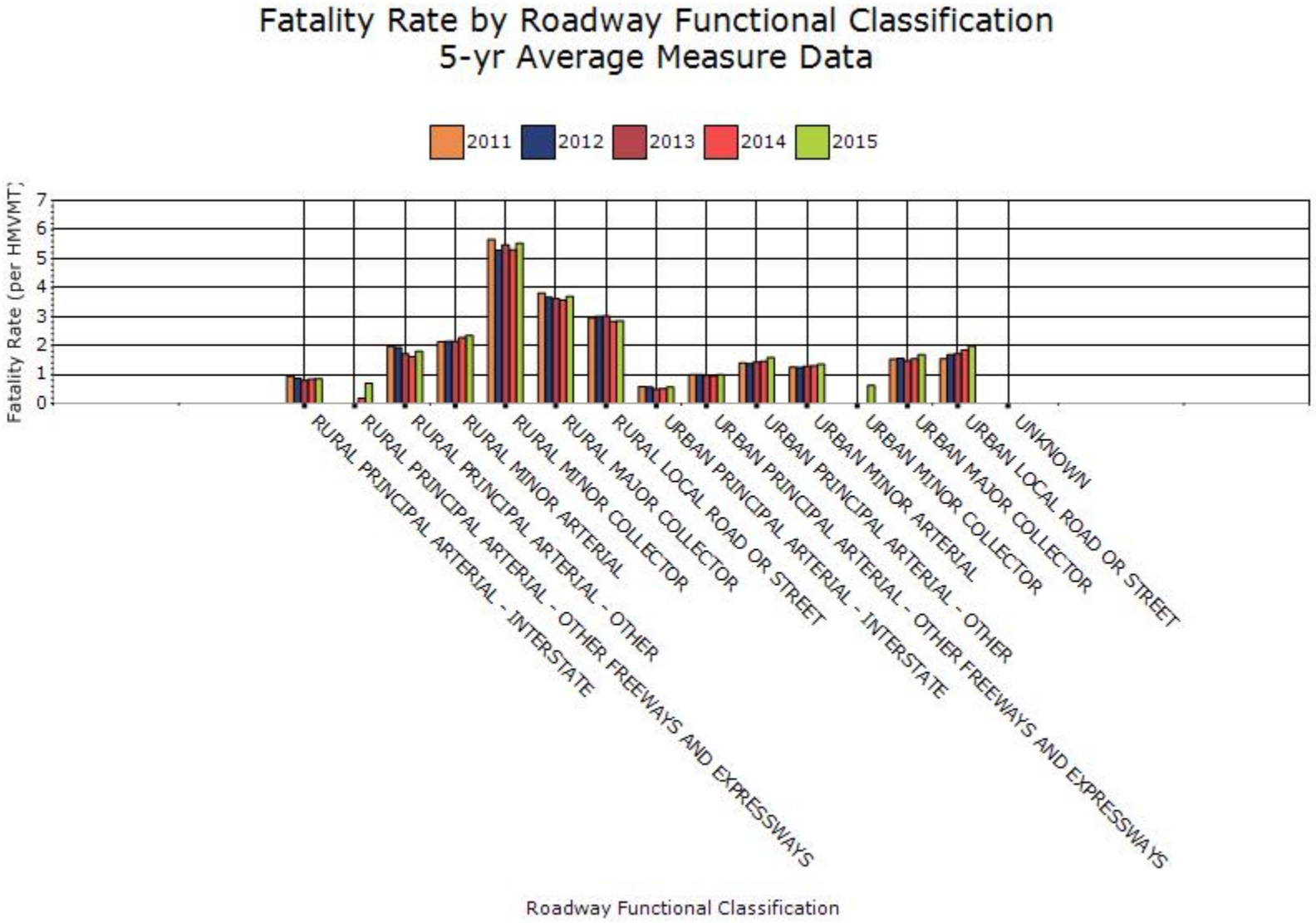
Year - 2015

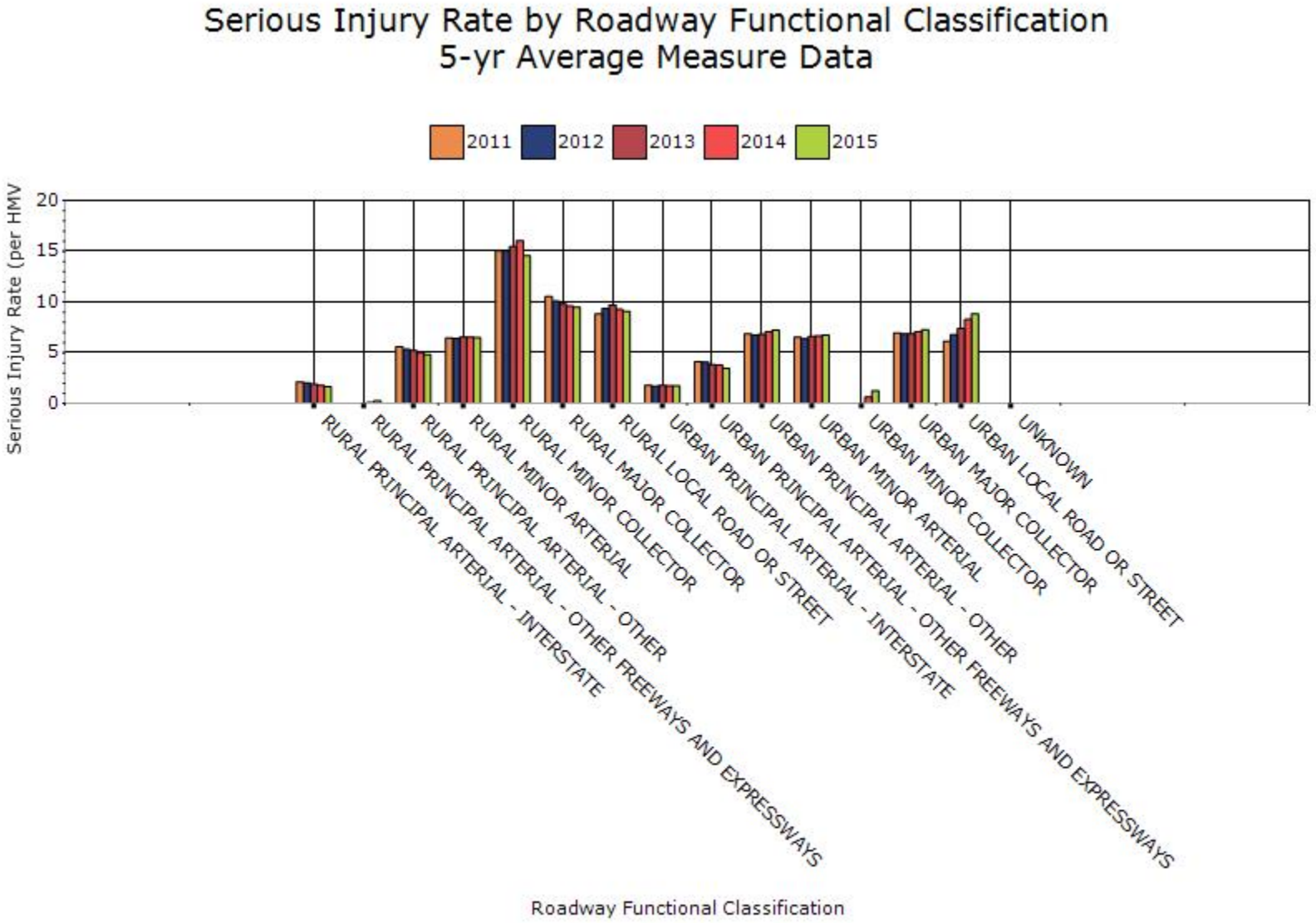
Function Classification	Number of fatalities	Number of serious injuries	Fatality rate (per HMVMT)	Serious injury rate (per HMVMT)
RURAL PRINCIPAL ARTERIAL - INTERSTATE	64.8	125.8	0.86	1.67
RURAL PRINCIPAL ARTERIAL - OTHER FREEWAYS AND EXPRESSWAYS	2.8	2.4	0.7	0.26
RURAL PRINCIPAL ARTERIAL - OTHER	73.2	197	1.8	4.81
RURAL MINOR ARTERIAL	94	261	2.35	6.48
RURAL MINOR COLLECTOR	14.8	39.2	5.53	14.56
RURAL MAJOR COLLECTOR	171.8	442.6	3.7	9.5
RURAL LOCAL ROAD OR STREET	73.2	231.8	2.85	9.08
URBAN PRINCIPAL ARTERIAL - INTERSTATE	36.6	112.2	0.56	1.73

URBAN PRINCIPAL ARTERIAL - OTHER FREEWAYS AND EXPRESSWAYS	7.6	26.6	1	3.46
URBAN PRINCIPAL ARTERIAL - OTHER	117	535.2	1.58	7.24
URBAN MINOR ARTERIAL	81	405.4	1.35	6.74
URBAN MINOR COLLECTOR	0.2	0.4	0.63	1.27
URBAN MAJOR COLLECTOR	59.2	256.4	1.68	7.26
URBAN LOCAL ROAD OR STREET	41.6	184.4	1.99	8.84
UNKNOWN	13.2	409.4		


Fatalities by Roadway Functional Classification
5-yr Average Measure Data
2011
2012
2013
2014
2015
# of Fatalities
250
200
150
100
50
0
RURAL PRINCIPAL ARTERIAL - INTERSTATE
RURAL PRINCIPAL ARTERIAL - OTHER FREEWAYS AND EXPRESSWAYS
RURAL PRINCIPAL ARTERIAL - OTHER
RURAL MINOR ARTERIAL
RURAL MINOR COLLECTOR
RURAL MAJOR COLLECTOR
RURAL LOCAL ROAD OR STREET
URBAN PRINCIPAL ARTERIAL - INTERSTATE
URBAN PRINCIPAL ARTERIAL - OTHER FREEWAYS AND EXPRESSWAYS
URBAN PRINCIPAL ARTERIAL - OTHER
URBAN MINOR ARTERIAL
URBAN MINOR COLLECTOR
URBAN MAJOR COLLECTOR
URBAN LOCAL ROAD OR STREET
UNKNOWN
Roadway Functional Classification

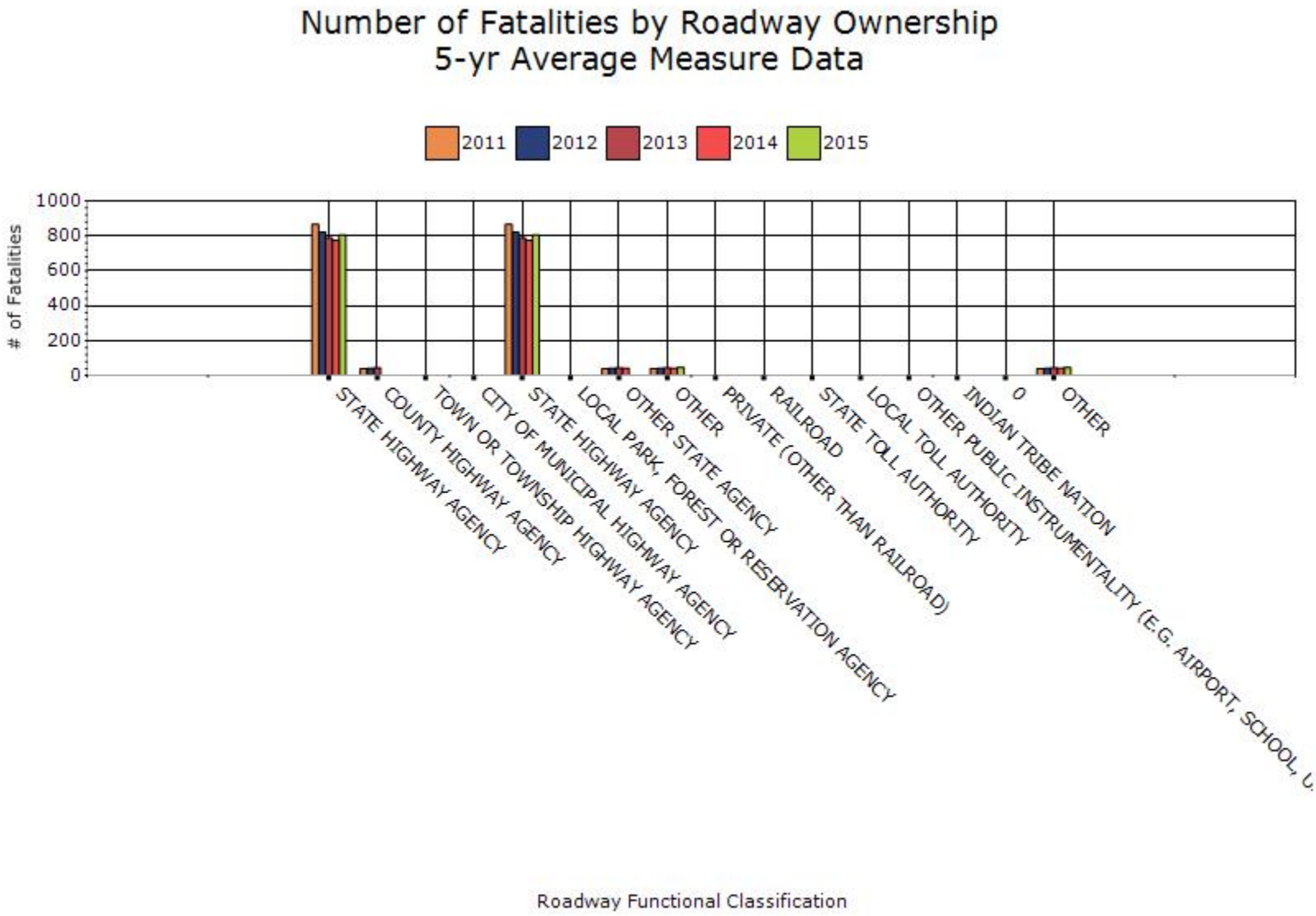

Serious Injuries by Roadway Functional Classification
5-yr Average Measure Data
2011
2012
2013
2014
2015
# of Serious Injuries
800
600
400
200
0
RURAL PRINCIPAL ARTERIAL - INTERSTATE
RURAL PRINCIPAL ARTERIAL - OTHER FREEWAYS AND EXPRESSWAYS
RURAL PRINCIPAL ARTERIAL - OTHER
RURAL MINOR ARTERIAL
RURAL MINOR COLLECTOR
RURAL MAJOR COLLECTOR
RURAL LOCAL ROAD OR STREET
URBAN PRINCIPAL ARTERIAL - INTERSTATE
URBAN PRINCIPAL ARTERIAL - OTHER FREEWAYS AND EXPRESSWAYS
URBAN PRINCIPAL ARTERIAL - OTHER
URBAN MINOR ARTERIAL
URBAN MINOR COLLECTOR
URBAN MAJOR COLLECTOR
URBAN LOCAL ROAD OR STREET
UNKNOWN
Roadway Functional Classification

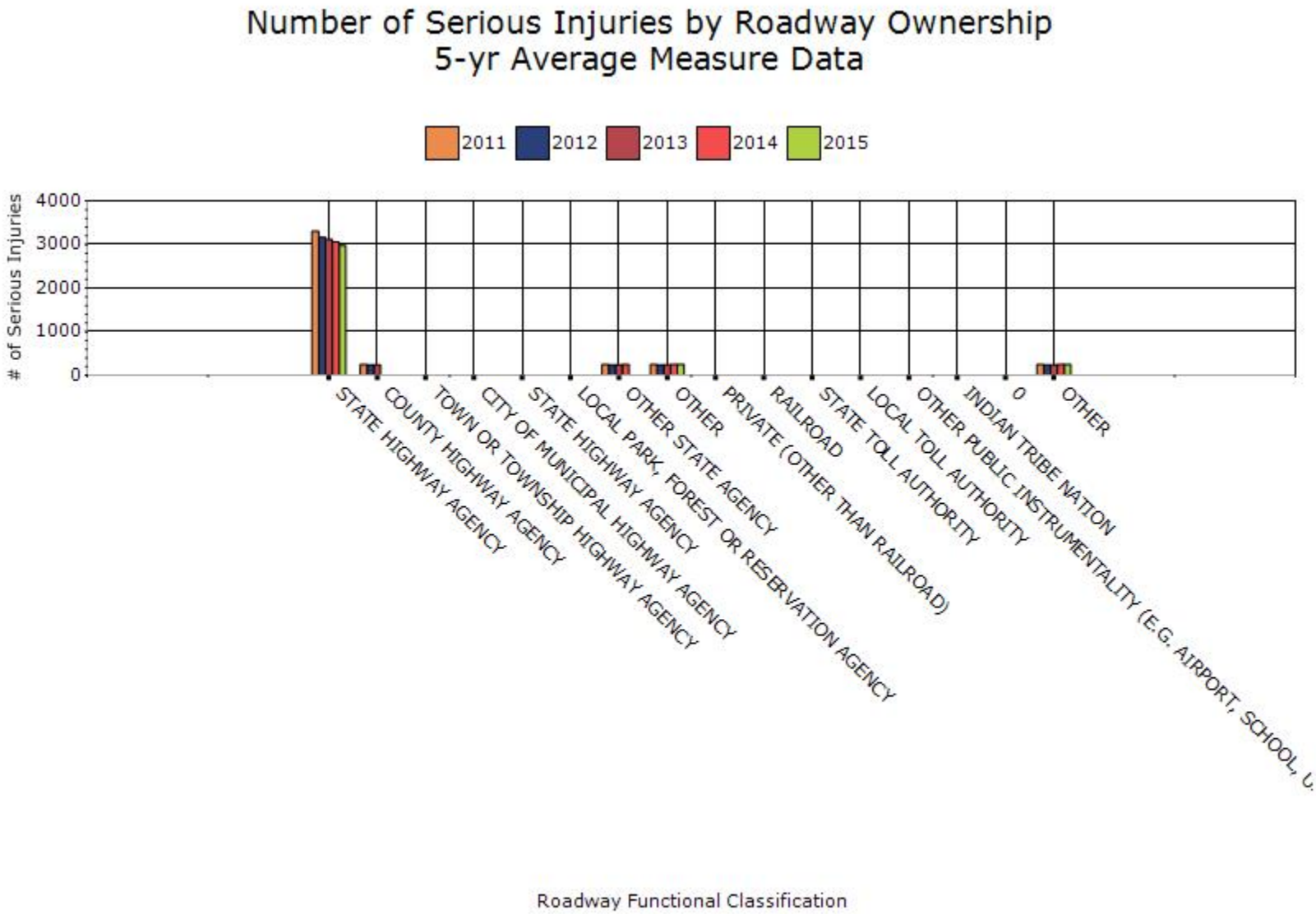

Fatality Rate by Roadway Functional Classification
5-yr Average Measure Data
2011
2012
2013
2014
2015
Fatality Rate (per HMVMT)
0
1
2
3
4
5
6
7
RURAL PRINCIPAL ARTERIAL - INTERSTATE
RURAL PRINCIPAL ARTERIAL - OTHER FREEWAYS AND EXPRESSWAYS
RURAL PRINCIPAL ARTERIAL - OTHER
RURAL MINOR ARTERIAL
RURAL MINOR COLLECTOR
RURAL MAJOR COLLECTOR
RURAL LOCAL ROAD OR STREET
URBAN PRINCIPAL ARTERIAL - INTERSTATE
URBAN PRINCIPAL ARTERIAL - OTHER FREEWAYS AND EXPRESSWAYS
URBAN PRINCIPAL ARTERIAL - OTHER
URBAN MINOR ARTERIAL
URBAN MINOR COLLECTOR
URBAN MAJOR COLLECTOR
URBAN LOCAL ROAD OR STREET
UNKNOWN
Roadway Functional Classification

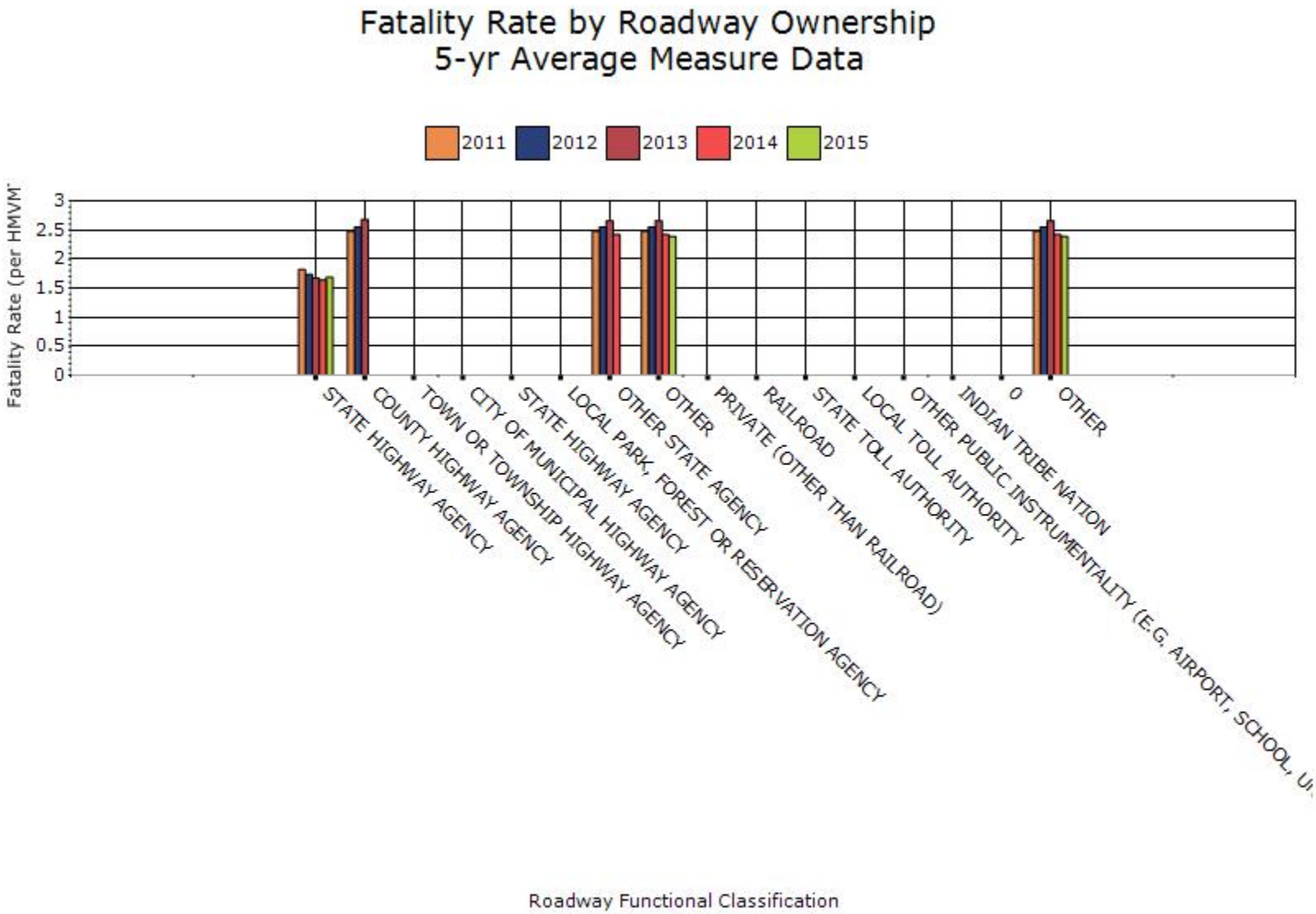

Serious Injury Rate by Roadway Functional Classification
5-yr Average Measure Data
2011
2012
2013
2014
2015
Serious Injury Rate (per HMV
20
15
10
5
0
RURAL PRINCIPAL ARTERIAL - INTERSTATE
RURAL PRINCIPAL ARTERIAL - OTHER FREEWAYS AND EXPRESSWAYS
RURAL PRINCIPAL ARTERIAL - OTHER
RURAL MINOR ARTERIAL
RURAL MINOR COLLECTOR
RURAL MAJOR COLLECTOR
RURAL LOCAL ROAD OR STREET
URBAN PRINCIPAL ARTERIAL - INTERSTATE
URBAN PRINCIPAL ARTERIAL - OTHER FREEWAYS AND EXPRESSWAYS
URBAN PRINCIPAL ARTERIAL - OTHER
URBAN MINOR ARTERIAL
URBAN MINOR COLLECTOR
URBAN MAJOR COLLECTOR
URBAN LOCAL ROAD OR STREET
UNKNOWN
Roadway Functional Classification

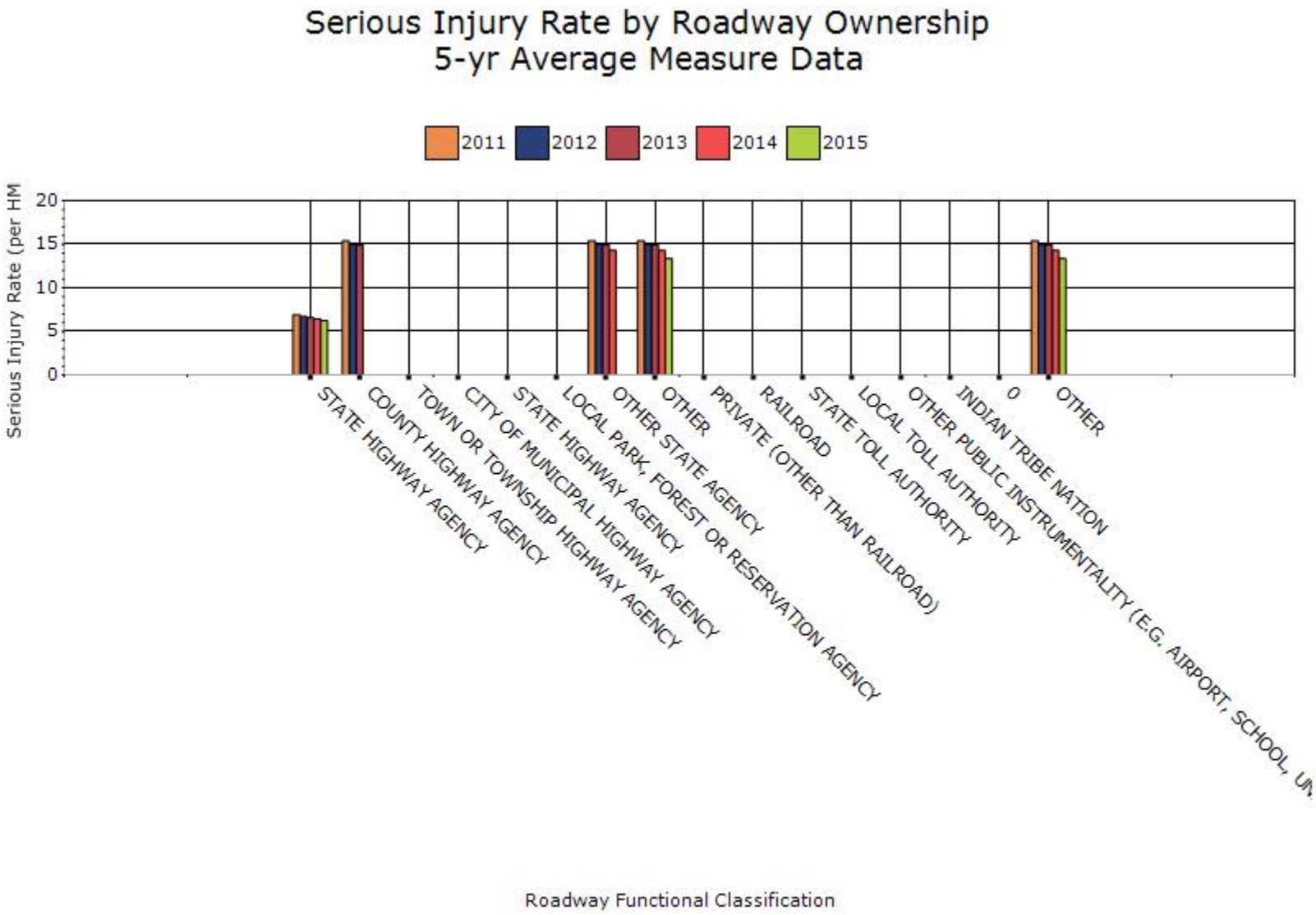
Year - 2015

Roadway Ownership	Number of fatalities	Number of serious injuries	Fatality rate (per HMVMT)	Serious injury rate (per HMVMT)
STATE HIGHWAY AGENCY	805.6	2976.2	1.69	6.25
STATE HIGHWAY AGENCY	805.6			
OTHER	45.4	253.6	2.39	13.36
OTHER	45.4	253.6	2.39	13.36


Number of Fatalities by Roadway Ownership
5-yr Average Measure Data
2011
2012
2013
2014
2015
# of Fatalities
1000
800
600
400
200
0
STATE HIGHWAY AGENCY
COUNTY HIGHWAY AGENCY
TOWN OR TOWNSHIP HIGHWAY AGENCY
CITY OF MUNICIPAL HIGHWAY AGENCY
STATE HIGHWAY AGENCY
LOCAL PARK, FOREST OR RESERVATION AGENCY
OTHER STATE AGENCY
OTHER
PRIVATE (OTHER THAN RAILROAD)
RAILROAD
STATE TOLL AUTHORITY
LOCAL TOLL AUTHORITY
OTHER PUBLIC INSTRUMENTALITY (E.G. AIRPORT, SCHOOL, U
INDIAN TRIBE NATION
0
OTHER
Roadway Functional Classification


Number of Serious Injuries by Roadway Ownership
5-yr Average Measure Data
2011
2012
2013
2014
2015
# of Serious Injuries
4000
3000
2000
1000
0
STATE HIGHWAY AGENCY
COUNTY HIGHWAY AGENCY
TOWN OR TOWNSHIP HIGHWAY AGENCY
CITY OF MUNICIPAL HIGHWAY AGENCY
STATE HIGHWAY AGENCY
LOCAL PARK, FOREST OR RESERVATION AGENCY
OTHER STATE AGENCY
OTHER
PRIVATE (OTHER THAN RAILROAD)
RAILROAD
STATE TOLL AUTHORITY
LOCAL TOLL AUTHORITY
OTHER PUBLIC INSTRUMENTALITY (E.G. AIRPORT, SCHOOL, U
INDIAN TRIBE NATION
0
OTHER
Roadway Functional Classification


Fatality Rate by Roadway Ownership
5-yr Average Measure Data
2011
2012
2013
2014
2015
Fatality Rate (per HMVM
3
2.5
2
1.5
1
0.5
0
STATE HIGHWAY AGENCY
COUNTY HIGHWAY AGENCY
TOWN OR TOWNSHIP HIGHWAY AGENCY
CITY OF MUNICIPAL HIGHWAY AGENCY
STATE HIGHWAY AGENCY
LOCAL PARK, FOREST OR RESERVATION AGENCY
OTHER STATE AGENCY
OTHER
PRIVATE (OTHER THAN RAILROAD)
RAILROAD
STATE TOLL AUTHORITY
LOCAL TOLL AUTHORITY
OTHER PUBLIC INSTRUMENTALITY (E.G. AIRPORT, SCHOOL, U
INDIAN TRIBE NATION
0
OTHER
Roadway Functional Classification


Serious Injury Rate by Roadway Ownership
5-yr Average Measure Data
2011
2012
2013
2014
2015
Serious Injury Rate (per HM
20
15
10
5
0
STATE HIGHWAY AGENCY
COUNTY HIGHWAY AGENCY
TOWN OR TOWNSHIP HIGHWAY AGENCY
CITY OF MUNICIPAL HIGHWAY AGENCY
STATE HIGHWAY AGENCY
LOCAL PARK, FOREST OR RESERVATION AGENCY
OTHER STATE AGENCY
OTHER
PRIVATE (OTHER THAN RAILROAD)
RAILROAD
STATE TOLL AUTHORITY
LOCAL TOLL AUTHORITY
OTHER PUBLIC INSTRUMENTALITY (E.G. AIRPORT, SCHOOL, UN
INDIAN TRIBE NATION
0
OTHER
Roadway Functional Classification

Describe any other aspects of the general highway safety trends on which you would like to elaborate.

None.

Application of Special Rules

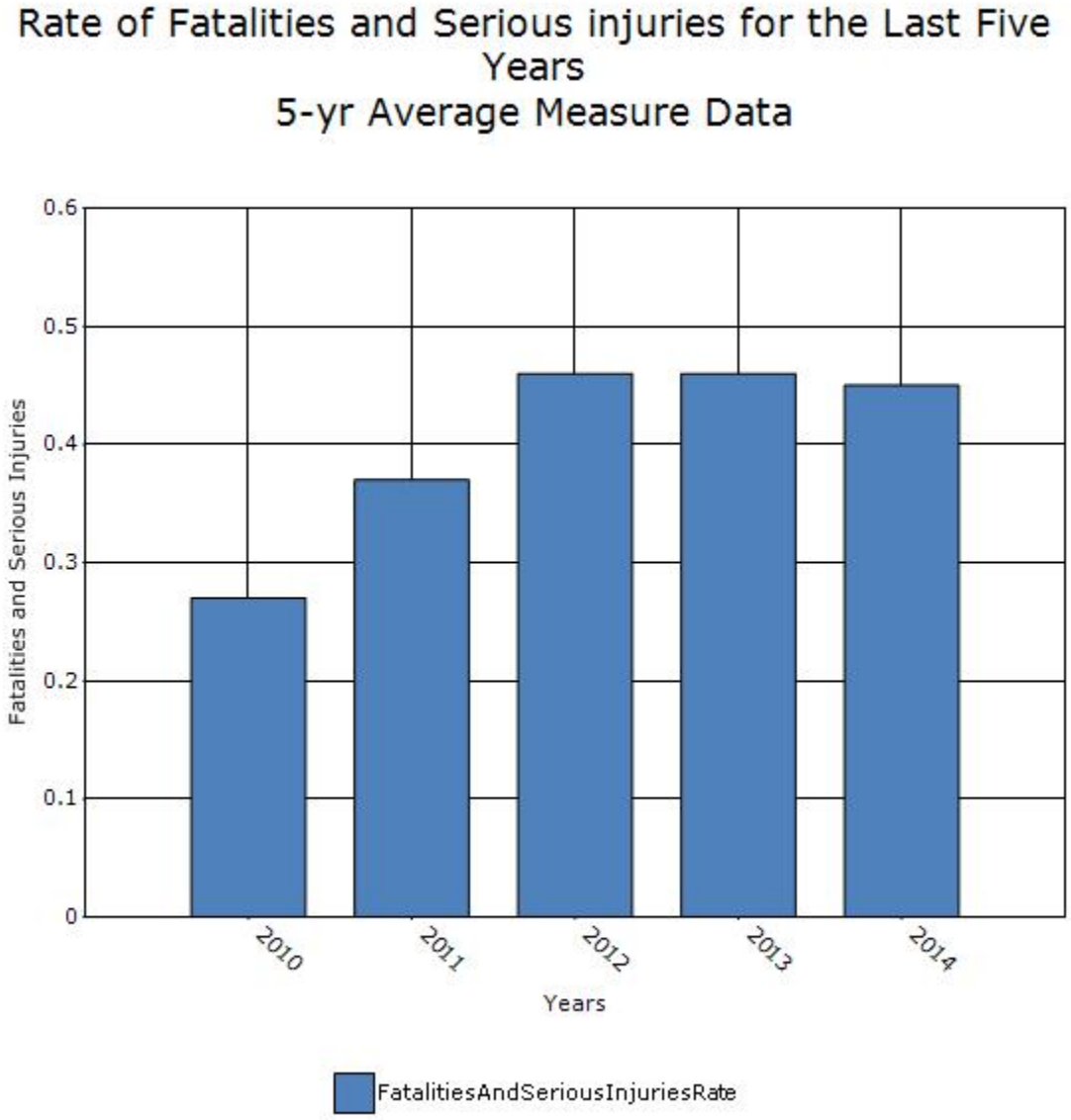
Present the rate of traffic fatalities and serious injuries per capita for drivers and pedestrians over the age of 65.

Older Driver Performance Measures	2010	2011	2012	2013	2014
Fatality rate (per capita)	0.09	0.12	0.14	0.13	0.13
Serious injury rate (per capita)	0.19	0.25	0.32	0.33	0.32
Fatality and serious injury rate (per capita)	0.27	0.37	0.46	0.46	0.45

*Performance measure data is presented using a five-year rolling average.

The number of fatalities for drivers and pedestrians age 65 and older was obtained from the Fatality Analysis Reporting System (FARS). The number of serious injuries for drivers and pedestrians age 65 and older was obtained from South Carolina's data system. The population figures were obtained from the MAP-21 Older Drivers and Pedestrians Special Rule Final Guidance. The rate was obtained by taking the number of fatalities (or serious injuries or serious injuries and fatalities) and dividing by the population figure. For example, the fatality rate for 2014 was obtained by dividing 98 by 762 to get 0.13.

Yearly data for 2006 and 2007 are not available; therefore, the 5-year averages calculated for 2010 and 2011 are incorrect.



Does the older driver special rule apply to your state?

No

Assessment of the Effectiveness of the Improvements (Program Evaluation)

What indicators of success can you use to demonstrate effectiveness and success in the Highway Safety Improvement Program?

Benefit/cost

If 'benefit/cost', indicate the overall Highway Safety Improvement Program benefit/cost ratio.

3.95

What significant programmatic changes have occurred since the last reporting period?

None

Briefly describe significant program changes that have occurred since the last reporting period.

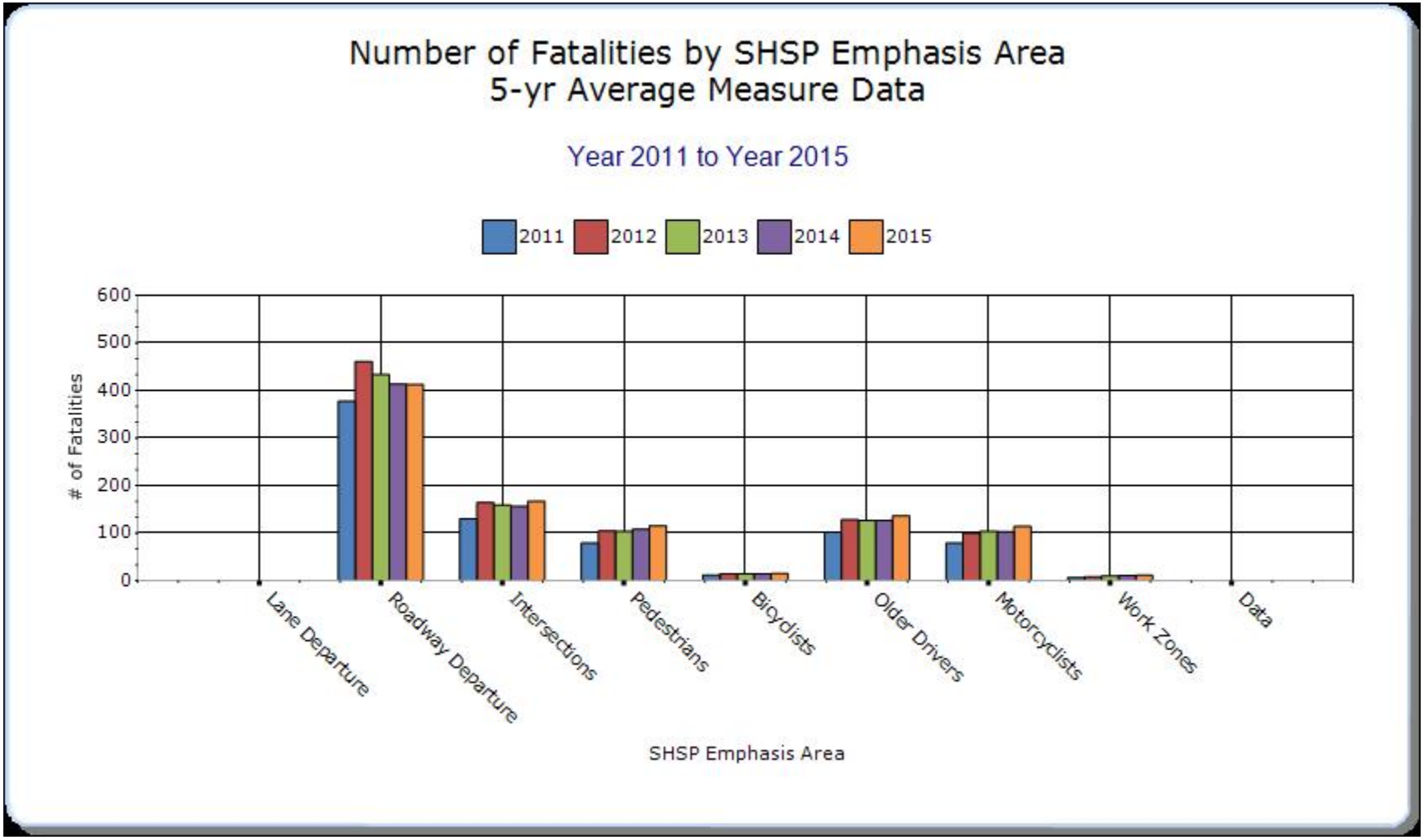
None.

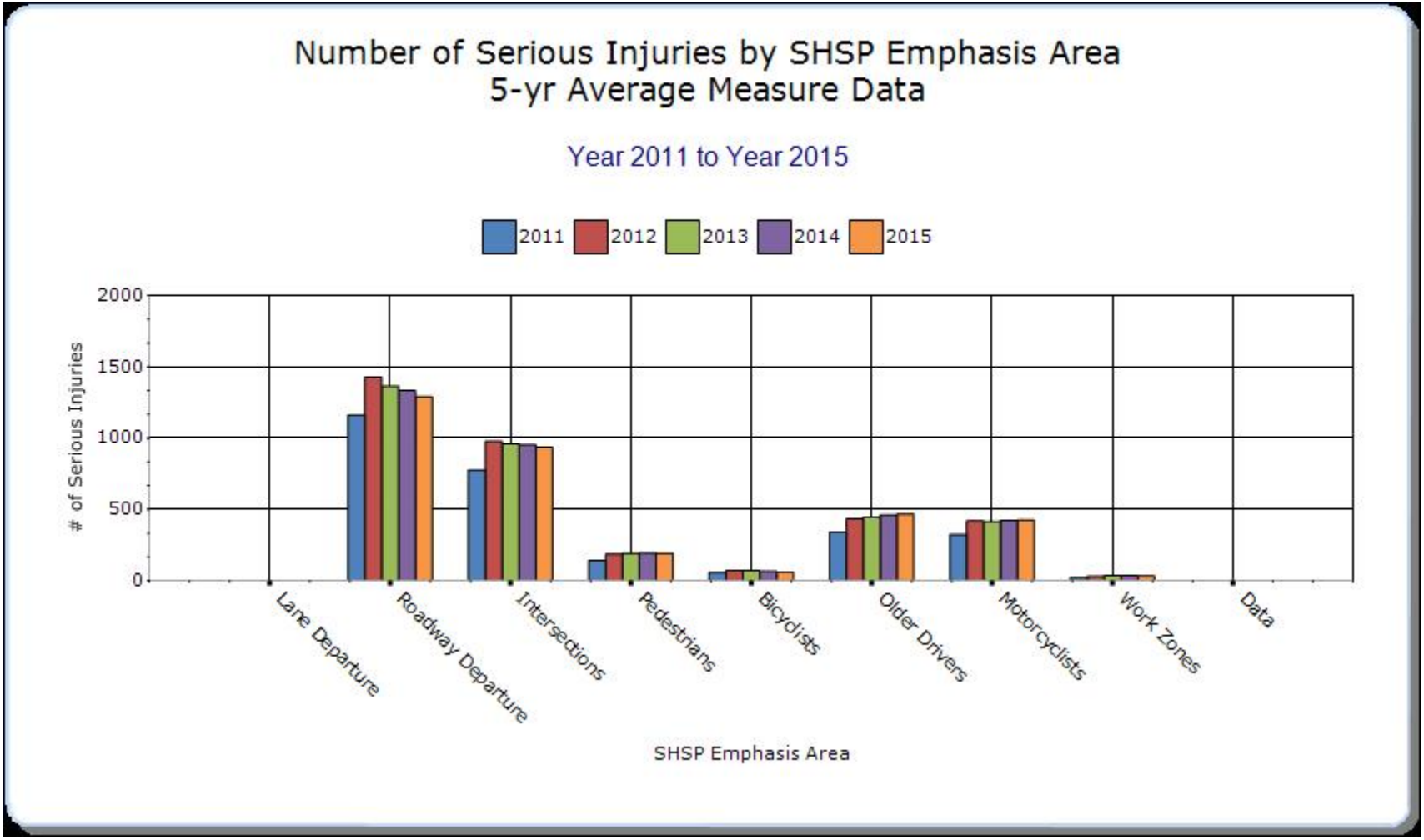
SHSP Emphasis Areas

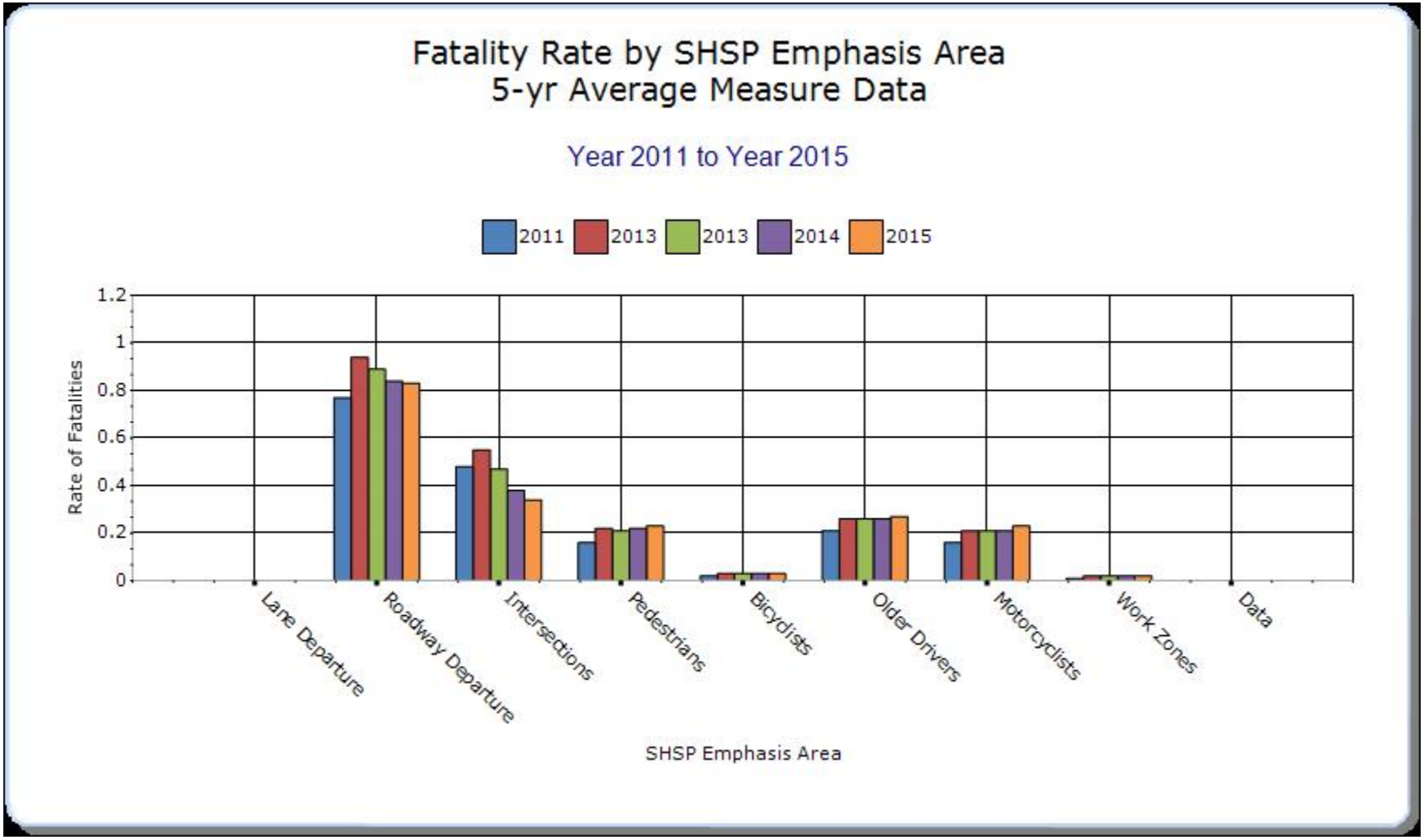
For each SHSP emphasis area that relates to the HSIP, present trends in emphasis area performance measures.

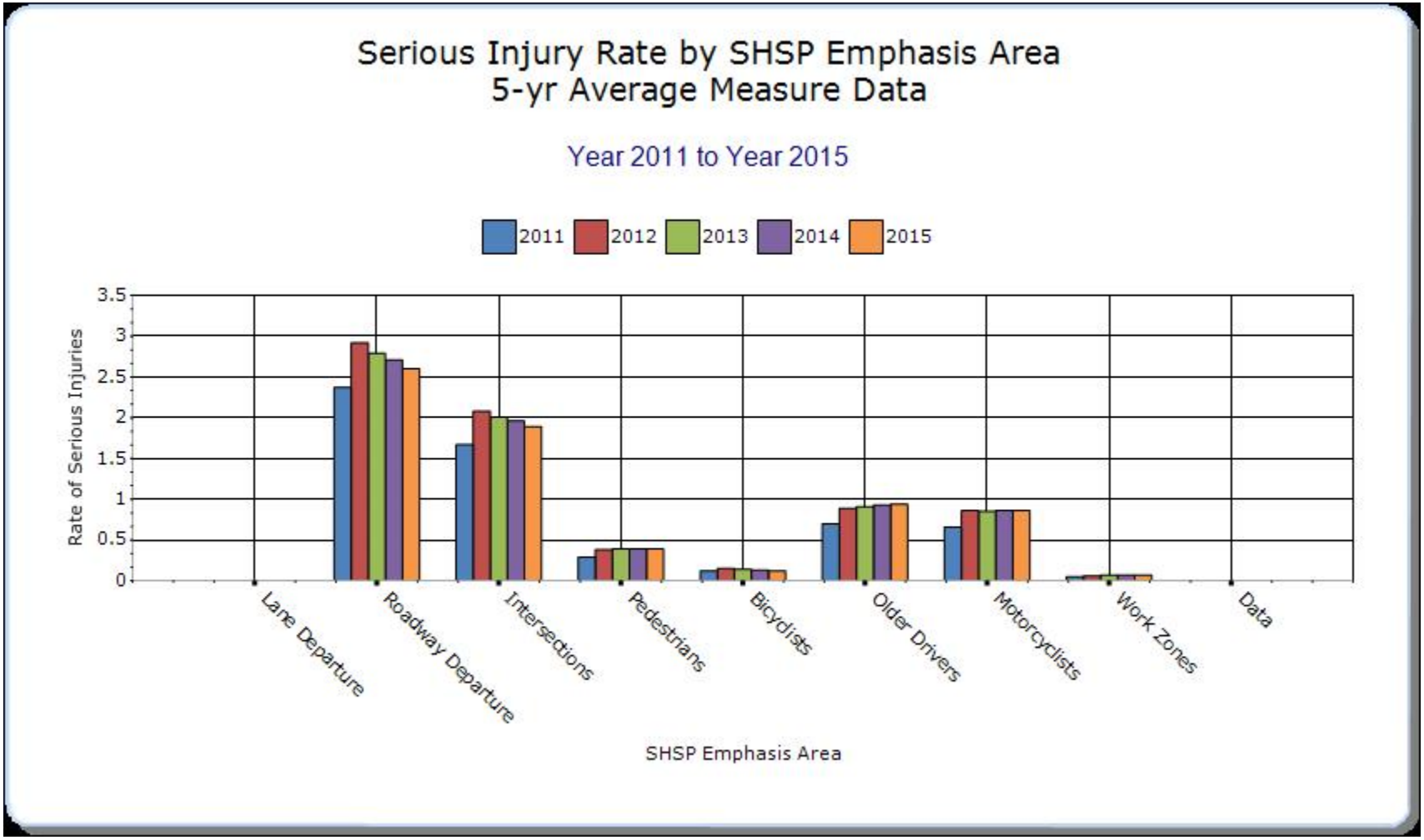
Year - 2015

HSIP-related SHSP Emphasis Areas	Target Crash Type	Number of fatalities	Number of serious injuries	Fatality rate (per HMVMT)	Serious injury rate (per HMVMT)	Other-1	Other-2	Other-3
Roadway Departure		412.8	1290	0.83	2.6			
Intersections		167.4	936.4	0.34	1.89			
Pedestrians		115.6	192.2	0.23	0.39			
Bicyclists		15	59.8	0.03	0.12			
Older Drivers		136	465.8	0.27	0.94			
Motorcyclists		114.2	424	0.23	0.86			
Work Zones		11.6	33.6	0.02	0.07			


Number of Fatalities by SHSP Emphasis Area
5-yr Average Measure Data
Year 2011 to Year 2015
2011
2012
2013
2014
2015
600
500
400
300
200
100
0
# of Fatalities
Lane Departure
Roadway Departure
Intersections
Pedestrians
Bicyclists
Older Drivers
Motorcyclists
Work Zones
Data
SHSP Emphasis Area


Number of Serious Injuries by SHSP Emphasis Area
5-yr Average Measure Data
Year 2011 to Year 2015
2011
2012
2013
2014
2015
2000
1500
1000
500
0
# of Serious Injuries
Lane Departure
Roadway Departure
Intersections
Pedestrians
Bicyclists
Older Drivers
Motorcyclists
Work Zones
Data
SHSP Emphasis Area


Fatality Rate by SHSP Emphasis Area
5-yr Average Measure Data
Year 2011 to Year 2015
2011
2013
2013
2014
2015
Rate of Fatalities
1.2
1
0.8
0.6
0.4
0.2
0
Lane Departure
Roadway Departure
Intersections
Pedestrians
Bicyclists
Older Drivers
Motorcyclists
Work Zones
Data
SHSP Emphasis Area



Groups of similar project types

Present the overall effectiveness of groups of similar types of projects.

Year - 2015

HSIP Sub-program Types	Target Crash Type	Number of fatalities	Number of serious injuries	Fatality rate (per HMVMT)	Serious injury rate (per HMVMT)	Other-1	Other-2	Other-3

Systemic Treatments

Present the overall effectiveness of systemic treatments.

Year - 2015

Systemic improvement	Target Crash Type	Number of fatalities	Number of serious injuries	Fatality rate (per HMVMT)	Serious injury rate (per HMVMT)	Other-1	Other-2	Other-3

Describe any other aspects of the overall Highway Safety Improvement Program effectiveness on which you would like to elaborate.

None.

Project Evaluation

Provide project evaluation data for completed projects (optional).

Location	Functional Class	Improvement Category	Improvement Type	Bef-Fatal	Bef-Serious Injury	Bef-All Injuries	Bef-PDO	Bef-Total	Aft-Fatal	Aft-Serious Injury	Aft-All Injuries	Aft-PDO	Aft-Total	Evaluation Results (Benefit/ Cost Ratio)
SC 118 @ S-895	Principal Arterial - Other	Intersection geometry	Auxiliary lanes - add left-turn lane			15	15	30			1	3	4	3.76
SC 116 (Laurel Bay Road) @ S-86 (Shanklin Road)	Urban Major Collector	Intersection geometry	Intersection geometrics - modify skew angle			4	9	13		1	3	8	12	-1.19

S-40 (Joe Frazier Road) @ S-263 (Morall Drive/ Pine Grove Road)	Urban Major Collector	Intersection traffic control	Modify control - two-way stop to roundabout			7	10	17			1	2	3	2.63
S-63 (Raccoon Road) @ S-79 (Silver Road)	Rural Major Collector	Intersection traffic control	Modify control - two-way stop to roundabout		1	10	13	24			1	5	6	2.85
US 15 @ S-13	Rural Minor Arterial	Intersection geometry	Intersection geometrics - modify skew angle			8	6	14						3.68
S-13 (Central Ave) @ S-58 (W. Butternut Rd)	Urban Major Collector	Intersection geometry	Intersection geometrics - modify skew angle		3	6	19	28			3	15	18	1.89

S-62 (Wachesaw Road) @ S-391/S-878 (Old Kings Hwy)	Urban Major Collector	Intersection traffic control	Modify control - two-way stop to roundabout			3	5	8			1	2	3	0.61
S-50 (Fork Shoals Road) @ S-221 (Conestee Road)	Urban Major Collector	Intersection traffic control	Intersection traffic control - other			4	14	18		1	2	4	7	0.53
S-166 (Brushy Creek Road) @ S-347 (Hudson Road)	Urban Minor Arterial	Intersection geometry	Intersection geometrics - modify skew angle			9	65	74			2	18	20	1.79
S-31 (Red Bluff Road) @ S-568 (Heritage Road)	Rural Major Collector	Intersection geometry	Intersection geometrics - realignment to increase cross street offset			4	9	13			1	1	2	0.9

SC 336 (Old House Road) @ SC 462 (Lowcountry Drive)	Rural Minor Arterial	Intersection geometry	Auxiliary lanes - add left-turn lane		1	3	16	20			4	6	10	1.94
SC 160 @ S-42	Rural Principal Arterial - Other	Intersection traffic control	Systemic improvements - signal-controlled			6	22	28			2	21	23	0.31
SC 6 @ S-73 (Fish Hatchery Road)	Rural Major Collector	Intersection traffic control	Modify control - two-way stop to roundabout	1	3	15	14	33			4	6	10	29.77
S-34 (Platt Springs Rd) @ S-1910 (McLee Rd) & S-1848 (Kyzer Rd)	Rural Major Collector	Intersection geometry	Auxiliary lanes - add left-turn lane		1	5	18	24			2	16	18	0.77

S-77 (Two Notch Rd) @ S-278 (Calks Ferry Rd)	Rural Major Collector	Intersection geometry	Auxiliary lanes - add left-turn lane			4	7	11			1		1	0.65
SC 302 (Edmund Hwy) @ S-625 (Old Charleston Rd)	Rural Minor Arterial	Intersection geometry	Auxiliary lanes - add left-turn lane	1	1	9	16	27				3	3	20.68
S-70 (Two Notch Road) @ S-921 (Laurel Road)	Urban Major Collector	Intersection traffic control	Modify control - two-way stop to roundabout	1	1	15	19	36			1	4	5	23.83
SC 45 (Branchdale Highway) @ SC 310 (Camden Road)	Rural Major Collector	Intersection traffic control	Modify control - two-way stop to roundabout		1	11	5	17				6	6	3.73

S-83 @ S-1050	Rural Minor Arterial	Roadway	Roadway widening - add lane(s) along segment		1	13	67	81			14	76	90	-3.04
SC 120 (Pinewood Rd) @ S-251 (Starks Ferry Rd)	Rural Major Collector	Intersection geometry	Intersection geometrics - modify skew angle			7	4	11			1	3	4	1.13
US 521 (Camden Hwy) @ US 76 Business (Broad St)	Urban Principal Arterial - Other	Intersection geometry	Auxiliary lanes - add left-turn lane		3	15	39	57			7	16	23	5.18
S-64 (Lincoln Road) @ S-172 (Old Limestone Road)	Rural Major Collector	Intersection traffic control	Modify control - two-way stop to roundabout			4	10	14				2	2	1.59

S-77 (MP 15.7-16)	Rural Major Collector	Roadway	Rumble strips - edge or shoulder		1	2	3	6				1	1	7.98
S-65 (MP 0-6.75)	Rural Major Collector	Roadway	Rumble strips - edge or shoulder	2	2	29	62	95	1	2	32	59	94	-20.22
I-85 (MP 95.3-96.3)	Rural Principal Arteria - Interstate	Roadway	Pavement surface - high friction surface	1	3	6	52	62			11	34	45	6.95
I-26 (MP 75.5-76.5; MP 81.5-83.1; MP 85.2-85.7)	Rural Principal Arteria - Interstate	Roadway	Pavement surface - high friction surface	1	7	43	221	272		1	27	109	137	3.94

Optional Attachments

Sections	Files Attached

Glossary

5 year rolling average means the average of five individual, consecutive annual points of data (e.g. annual fatality rate).
Emphasis area means a highway safety priority in a State's SHSP, identified through a data-driven, collaborative process.
Highway safety improvement project means strategies, activities and projects on a public road that are consistent with a State strategic highway safety plan and corrects or improves a hazardous road location or feature or addresses a highway safety problem.
HMVMT means hundred million vehicle miles traveled.
Non-infrastructure projects are projects that do not result in construction. Examples of non-infrastructure projects include road safety audits, transportation safety planning activities, improvements in the collection and analysis of data, education and outreach, and enforcement activities.
Older driver special rule applies if traffic fatalities and serious injuries per capita for drivers and pedestrians over the age of 65 in a State increases during the most recent 2-year period for which data are available, as defined in the Older Driver and Pedestrian Special Rule Interim Guidance dated February 13, 2013.
Performance measure means indicators that enable decision-makers and other stakeholders to monitor changes in system condition and performance against established visions, goals, and objectives.
Programmed funds mean those funds that have been programmed in the Statewide Transportation Improvement Program (STIP) to be expended on highway safety improvement projects.
Roadway Functional Classification means the process by which streets and highways are grouped into classes, or systems, according to the character of service they are intended to provide.
Strategic Highway Safety Plan (SHSP) means a comprehensive, multi-disciplinary plan, based on safety data developed by a State Department of Transportation in accordance with 23 U.S.C. 148.
Systematic refers to an approach where an agency deploys countermeasures at all locations across a system.
Systemic safety improvement means an improvement that is widely implemented based on high risk roadway features that are correlated with specific severe crash types.
Transfer means, in accordance with provisions of 23 U.S.C. 126, a State may transfer from an apportionment under section 104(b) not to exceed 50 percent of the amount apportioned for the fiscal year to any other apportionment of the State under that section.