Highway Safety Improvement Program

Data Driven Decisions

Alabama
Highway Safety Improvement Program
2016 Annual Report

Prepared by: AL

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

The Alabama Department of Transportation (ALDOT) through the Design Bureau, Traffic Design Division, and Traffic & Safety Operations Section (TSOS) is responsible for the administration of the Highway Safety Improvement Program (HSIP). The goal for the TSOS is to provide the tools, processes and guidance necessary to promote highway safety efforts that lead to a reduction in the number and severity of crashes on all public roads in Alabama.

The HSIP projects are consistent with the Alabama Strategic Highway Safety Plan (SHSP) 2nd Edition, version 2012. The SHSP is scheduled to be updated in 2017. The next version of the Alabama SHSP will focus on implementing regional SHSPs following the Rural/Regional Planning Organizations (RPOs) as the geographical boundaries for each region. Specific emphasis areas will be identified by local stakeholders to develop performance measures with proven countermeasures.

The current focus of Alabama's SHSP is the "Toward Zero Deaths" initiative. Additionally, Alabama has adopted the goal of reducing fatalities by 50% within a 20-year time period. Fatal crashes had dropped significantly over the past decade from 2003 to 2012. Alabama had seen a steady decline in the number of fatalities and the fatality rate during this same period, but has recently seen an uptick in fatalities over the past couple of years.

The SHSP has five key focus areas: Driver Behavior, Infrastructure Countermeasures, Legislative Initiatives, Traffic Safety Information Systems and Safety Stakeholders Community. The SHSP was developed in conjunction with the Alabama Department of Economic and Communities Affairs (ADECA) and multiple agencies and organizations. ADECA is responsible for the implementation of the National Highway Traffic Safety Administration (NHTSA) programs. The human behavioral aspects of the SHSP incorporate ADECA'S Statewide Highway Safety Plan which addresses the safety program behavioral elements related to occupant restraint use, impaired driving, distracted driving, speed, young drivers, motorcycles, and pedestrians.

HSIP projects have focused on the three (3) areas: Infrastructure Countermeasures (construction/supportive programs), Driver Behavior (safety outreach campaigns and overtime enforcement efforts), and Traffic Safety Information Systems (crash data analysis).

HSIP Infrastructure projects are developed through safety and operational analysis using crash data statistics, crash patterns, and benefit-cost engineering analysis. The projects have been more systemic in recent years and target more specific needs identified through data analysis such as Interstate Median Barrier, Shoulder Widening Program, Rumble Strips, and Horizontal Curve Safety Programs.

HSIP Infrastructure Projects/Tool Development

The Interstate Median Barrier program and the Shoulder Widening Program are safety programs which were established in 2002 and 2006, respectively. The Interstate Median Barrier program addresses

median cross over crashes by installing median cable along selected sections of interstate with a high pattern of median cross over crashes. The shoulder widening program addresses the addition of two (2) feet of shoulder during maintenance resurfacing along state routes (where feasible).

In 2015, the Horizontal Curve Safety Program (HCSP) was the next systemic HSIP project developed and implemented. This program is evaluating horizontal curves on state maintained roads and is developing recommendations for traffic signing and pavement marking in accordance with the MUTCD 2009. In addition, high crash sites and roadway departure locations are undergoing road safety assessments (RSAs) to determine appropriate safety enhancements and countermeasures.

TSOS collaborates with various University Research Centers to identify and develop data and analytical tools and manuals such as ALSAFE: Development of an Alabama Specific Planning Level Safety Tool, and the Alabama Roundabout Guide.

ALSAFE will be a safety forecasting tool for analysis at the Traffic Analysis Zone level which is a common metric used by planners. ALSAFE will be a statewide planning level safety software tool which will aid ALDOT, Metropolitan Planning Organizations (MPOs), and Regional Planning Organizations (RPOs). These tools will be vital in the planning and selection process of addressing potential safety problems and countermeasures for human factors or needs that are identified

In the past few years, Alabama has been implementing conceptual designs for roundabouts. In order to maintain design consistency and to provide guidance, there was a need for the development of guidance for Alabama roundabouts. The Alabama Roundabout Guide will serve as a guide to the planning, design, construction, operation, and maintenance of roundabouts in Alabama.

Alabama is developing a process and procedures to implement the Highway Safety Manual (HSM) to provide a tool to assist in selecting and evaluating safety projects. The Center for Advanced Public Safety (CAPS) is contracted to develop Safety Performance Factors (SPF) for state route segments and intersections while the University of South Alabama has a project to develop SPFs for rural roads. The SPFs will be specific for Alabama by applying Highway Safety Manual (HSM) methodology during their development. By using these tools, the project selection and evaluation process will be enhanced.

Local Roads

Local roads safety programs are included in the HSIP program of projects. The Alabama Local Technical Assistance Program (LTAP) through Auburn University provides both training and practical application of safety principles to educate local entities. Other tools and equipment, such as the HSIP Manual provides guidance on how to apply for HSIP funds.

TSOS in conjunction with FHWA also hosted the first annual Rural Road Safety Conference in 2014, with the 3rd conference completed in October, 2017. The Conference focuses on local safety issues and provided training on various roadway safety topics.

Non-Infrastructure Safety Efforts

Non-Infrastructure Safety Efforts of Driver Behavior and Traffic Safety Information Systems areas of Alabama's current SHSP are managed by the Design Bureau, Traffic Design Division, Safety Management Section (SMS)

Law enforcement agencies are invited to participate in HSIP development committees such as the development of the Speed Management Manual and Road Safety Assessments (RSA) Manual. Their perspective and experience plays an important role in targeting effective countermeasures for the safety of the traveling public.

Safety outreach initiatives are coordinated with the ALDOT's Media and Community Relations Bureau, the Alabama State Law Enforcement Agency (formerly the Alabama Department of Public Safety), and ADECA. "Driver Sober or Get Pulled Over", "Click It or Ticket it" and "Work Zone Safety" are examples of the safety campaigns implemented annually. This partnership is effective in providing safety information to the public. Its focus is to reduce the number of fatalities and serious injuries that occur, especially during various holiday seasons.

ALDOT Media and Community Relations conducted a safety public education and awareness program that addressed the behavioral safety elements related to seatbelts, speeding, impaired and distracted driving, work zones, rail crossings and motorcycles. Working with the Governor's Office, May was proclaimed Motorcycle Safety Awareness Month, and July was proclaimed Distracted Driving Awareness Month by Alabama Governor Robert Bentley. Using varied communication channels and events, the ALDOT public education programs reached across the state of Alabama and generated news articles, advertisements and other marketing pieces that were viewed by our target audiences more than 35 million times.

Alabama crash data is maintained and accessed through the Critical Analysis Reporting Environment (CARE) software and its supporting data is maintained by the Center for Advanced Public Safety (CAPS) at the University of Alabama. This interface is used for crash analysis by both ALDOT and local agencies. This data system is used to assist in the preparation of this report as well as the SHSP. The CARE program is critical in the development of the HSIP for assessing safety information.

ALDOT has made great strides to develop and implement safety programs and provide public awareness but more efforts are needed to continue the efforts to meet the "Toward Zero Death" Initiatives. This is a corporative effort through partnerships with other agencies and addressing safety elements through the SHSP to reduce fatalities and serious injuries throughout the state of Alabama.

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.

Local Roads are addressed through the HSIP by using crash data analysis and safety and operations analysis. Alabama is proactive in the development of safety tools and manuals for use of the analysis of local roads.

ALDOT has updated the HSIP Manual which provides an overview of the HSIP program. This manual provides aid for local agencies, MPOs/RPOs, and local ALDOT Region Personnel with a focus on the eligibility and funding requirements for HSIP projects. HSIP funds are available to local agencies for low cost safety improvements such as striping, markings, signage, traffic signal upgrades, etc. Project selections are based upon a benefit to cost analysis. Training has been provided on the HSIP manual and HSIP application process.

Other local tools under development are the United States Road Assessment Program (usRAP). usRAP is intended to encourage highway agencies to make safety decisions in the management of road networks based on national assessment of risk as well as to develop roadway Star Ratings and Safer Road Investment Plans. usRAP can be used for risk mapping of crashes, safety performance tracking, and provides a star rating (based on inspection of roads to examine how well they protect used from involvement in crashes and from deaths and serious injuries when crashes occur.)

The development of Safety Performance Functions (SPFs) for rural two-lane roads of the HSM will assist in the analysis process for local roads. ALDOT developed a Road Safety Assessments (RSAs) program. A

RSA is a formal safety performance examination of existing and proposed roadways by an independent and multi-disciplinary team. This program will be available to both state and local government projects.

ALDOT's Safety Management Section (SMS) provides cities, counties and other municipalities with annual crash data summaries, high crash information locations, individual crash reports, and other crash-related information as needed. This crash data provides information to help identify immediate or potential safety needs. This data is also helpful in the selection process for safety program funding.

State and local agency personnel are presented opportunities to receive crash analysis training for the Critical Analysis Reporting Environment (CARE) program. CARE provides an analytical process to assess crash data for trends and use as needed. CARE training is provided several times during the year.

In September 2014, ALDOT in cooperation with FHWA and LTAP hosted its first annual Local Rural Road Safety Workshop and Conference. Subsequent to this first conference, we have had two additional conferences that have emphasized the implementation of the safety process through all stages of roadway planning, design and operations through practical guidance specifically geared to local/rural roads. We have averaged 125 participants per conference who have learned from various subject matter experts including the Road Safety 365 workshop, which was a one-day training session designed to provide local and rural agencies with practical and effective ways to implement safety solutions into their day-to-day activities and project development process. Participants also learned how to use the CARE system, to develop countermeasures for Stop-Controlled Intersections, Work Zone Safety for Local Roads, etc. The workshop and conference was very successful.

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

Design
Planning
Maintenance
Other-ALDOT County Transportation

Briefly describe coordination with internal partners.

Traffic & Safety Operations Section (TSOS) has several safety program partnerships with the ALDOT Maintenance Bureau. The initial safety program was developed between the TSOS and ALDOT's Maintenance Bureau to implement the statewide shoulder widening projects on resurfacing projects. The program addresses road departure crashes along rural state routes. This program coordinates with the state’s resurfacing program and provides two (2’) foot shoulders along routes with shoulder scoring, where feasible. HSIP funds are utilized to implement the improvements. The ALDOT Maintenance Bureau administers the program and assists TSOS in the identification of state routes that are being widened.

Additionally, ALDOT's Maintenance Bureau has been given the task of upgrading signage to meet the current MUTCD (Manual on Uniform Traffic Control Devices). As an effort to improve

safety, TSOS is collaborating by identifying high crash horizontal curve locations for enhanced signage upgrades. HSIP funding will be used to implement this portion of the overall program.

In 2012, TSOS initiated a pilot project for a potential statewide inventory of traffic control devices at signalized intersections. The pilot provided a mixture of urban and rural collections of traffic data inventory. The purpose of this study would be to collect data at each location for both the TSOS and the ALDOT Maintenance Bureau. TSOS is using this database to develop Safety Performance Functions (SPFs) for use with the Highway Safety Manual. Additionally, the Maintenance Bureau will be using the data to advance maintenance, operations, and financial management of the State's Traffic Signal Inventory. The project has now expanded statewide and ALDOT Computer Services will develop a database for the use of ALDOT Region personnel also. To date, approximately 1/3 of the signalized intersections along the state-maintained system have been inventoried.

TSOS has had other similar partnerships with ALDOT's County Transportation Bureau. This partnership was initially developed with the High Risk Rural Roads Program (HRRRP) and has expanded. Now ALDOT's County Transportation Bureau is active in the HSIP review committee of county applications and provides valid input on the development of other efforts to educate locals on safety issues. For instance, ALDOT's County Transportation Bureau assisted and participated in the Local Rural Roads Conference which was held in September 2014 and has been actively involved in subsequent conferences. This "hands on" approach has been successful in addressing Alabama's local roads safety needs and is beneficial in obligating HRRR and HSIP funds.

Another essential partnership is with the ALDOT's development of an Enterprise GIS (EGIS) system. ALDOT's Enterprise GIS (EGIS) is comprised of a Linear Referencing System for all the roads in the state of Alabama and its associated data attributes. EGIS's primary function has been to help process inventory data required for FHWA's Highway Performance Monitoring System's (HPMS) submittal. TSOS has a representative on the EGIS committee who gives a perspective on Safety Data related needs. TSOS has submitted an extensive list of Model Inventory of Roadway Elements (MIRE) data elements to the committee for consideration in the ALDOT's Light Detection and Ranging (LIDAR) data collection process.

Also, ALDOT is converting its current Link-Node system to GPS coordinates. Theses coordinates will be put into the CARE system and will allow past crash reports to have a GPS coordinate. The University of Alabama is leading this project and were initially tasked with translating ALDOT's digital copies of the Link Node maps drawn in MicroStation into a GIS format. Now that ALDOT's Enterprise GIS (EGIS) Linear Referencing System (LRS) has come into being, the university has been tasked with conflating the Link Node data to the new LRS system. Four counties have been selected for the development of the conflation process and then the university will then complete the final 63 counties. Lastly, the university has also been charged with developing an interactive Viewer/Editing program for the Links and Nodes and future changes to the data.

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

Metropolitan Planning Organizations
Governors Highway Safety Office
Other-County and Local Govt
Other-Ala Dept of Public Health
Other-Ala Dept of Public Safety
Other-Ala Dept of Education
Other-Alabama Department of Economic and Community Affairs

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

Other-Pending Development of SPFs/CMFs for use of HSM

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

Traffic & Safety Operations Section's vision is to develop and provide tools, processes, and guidance necessary to focus on reducing the number and severity of crashes for all public roads in Alabama. TSOS provides infrastructure road safety initiatives and strategies and provides rapid review, response, and resolution to roadway safety concerns.

TSOS administers the HSIP program by developing innovative and progressive programs consistent with the Alabama Strategic Highway Safety Plan (SHSP). The programs are planned by fiscal year with available HSIP funding. TSOS works closely with the FHWA Division Office Safety personnel to expedite obligating HSIP funds in a timely manner.

Implementing a proactive approach in administration, planning and coordinating HSIP projects, TSOS manages HSIP funds in a more progressive manner.

Program Methodology

Select the programs that are administered under the HSIP.

Median Barrier	Intersection	Horizontal Curve
Bicycle Safety	Rural State Highways	Skid Hazard

Crash Data	Roadway Departure	Low-Cost Spot Improvements
Sign Replacement And Improvement	Local Safety	Pedestrian Safety
Shoulder Improvement	Segments	

Program: **Median Barrier**
Date of Program Methodology: **7/29/2003**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic Volume	Median width
		Functional classification
		Roadside features
		Other-Use of HSM methodology

What project identification methodology was used for this program?
Crash frequency
Probability of specific crash types

Are local roads (non-state owned and operated) included or addressed in this program?
No

How are highway safety improvement projects advanced for implementation?
Other-Crash Analysis

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

Available funding	50
Projects are ranked by priority	50

Program: **Intersection**
Date of Program Methodology: **1/2/2000**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic	Functional classification
Fatal and serious injury crashes only	Volume	
		Roadside features

What project identification methodology was used for this program?
Crash frequency

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?
Other-Safety and Operations Analysis
Other-ALDOT Region selection of Candidates

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	1
Available funding	2

Program: **Horizontal Curve**
Date of Program Methodology: **1/2/2012**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic	Horizontal curvature
Fatal and serious injury crashes only	Volume	
		Functional classification
		Roadside features

What project identification methodology was used for this program?
Crash frequency

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).
Relative Weight in Scoring

Available funding	50
Ranking based on net benefit	50

Program: **Bicycle Safety**
Date of Program Methodology: **1/1/2014**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic Volume	Roadside features

What project identification methodology was used for this program?
Crash frequency

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?

How are highway safety improvement projects advanced for implementation?
Other-Recently authorization project for Vulnerable Users Handbook

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

Program: **Rural State Highways**
Date of Program Methodology: **1/2/2006**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic	Horizontal curvature
Fatal crashes only	Volume	
Fatal and serious injury crashes only		Roadside features
		Other-No of lanes

What project identification methodology was used for this program?
Crash frequency

Are local roads (non-state owned and operated) included or addressed in this program?
No

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).
Relative Weight in Scoring

Ranking based on B/C	50
Available funding	50

Program: **Skid Hazard**
Date of Program Methodology: **1/1/2013**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic	Horizontal curvature
Fatal and serious injury crashes only	Volume	

	Lane miles	Roadside features

What project identification methodology was used for this program?
Crash frequency

Are local roads (non-state owned and operated) included or addressed in this program?
No

How are highway safety improvement projects advanced for implementation?
Other-Program is being developed

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).
Relative Weight in Scoring

Available funding	50
Cost Effectiveness	50

Program: **Crash Data**
Date of Program Methodology: **1/1/1996**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic	
Fatal crashes only	Volume	
Fatal and serious injury crashes only		

What project identification methodology was used for this program?
Crash frequency

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?
Other-Use of the CARE system

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).
Relative Weight in Scoring

Data Available Statewide	100

Program: **Roadway Departure**
Date of Program Methodology: **1/2/2006**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic	Horizontal curvature
Fatal and serious injury crashes only	Volume	
	Lane miles	Roadside features
		Other-Existing Shoulder if applicable

What project identification methodology was used for this program?
Crash frequency

Are local roads (non-state owned and operated) included or addressed in this program?
No

How are highway safety improvement projects advanced for implementation?
selection committee
Other-In conjunction with Resurfacing Maintenance Program

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).
Relative Weight in Scoring

Available funding	50
Cost Effectiveness	50

Program: **Low-Cost Spot Improvements**
Date of Program Methodology: **1/1/1993**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic	Horizontal curvature
Fatal and serious injury crashes only	Volume	
		Functional classification
		Roadside features

What project identification methodology was used for this program?
Crash frequency

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?
Competitive application process

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).
Relative Weight in Scoring

Ranking based on B/C	50
Available funding	50

Program: **Sign Replacement And Improvement**
Date of Program Methodology: **1/1/2006**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic	Horizontal curvature
	Volume	Functional classification
		Roadside features

What project identification methodology was used for this program?
Crash frequency

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?
Other-HRRRP
Other-MUTCD REQUIREMENT

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

Available funding	1
Cost Effectiveness	2

Program: **Local Safety**
Date of Program Methodology: **2/1/2006**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Volume	Functional classification
Fatal and serious injury crashes only		Roadside features

What project identification methodology was used for this program?
Crash frequency
Excess expected crash frequency using method of moments

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).
Relative Weight in Scoring

Ranking based on B/C	25
Available funding	50
Cost Effectiveness	25

Program: **Pedestrian Safety**
Date of Program Methodology: **1/1/2014**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic Volume	Functional classification

What project identification methodology was used for this program?
Crash frequency

Are local roads (non-state owned and operated) included or addressed in this program?
No

How are highway safety improvement projects advanced for implementation?
Other-Recently authorized project_Vulnerable User Handbook

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

Program: **Shoulder Improvement**
Date of Program Methodology: **1/2/2006**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic	Horizontal curvature
Fatal and serious injury crashes only	Volume	
	Lane miles	Roadside features

What project identification methodology was used for this program?
Crash frequency

Are local roads (non-state owned and operated) included or addressed in this program?
No

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

Available funding	1
Cost Effectiveness	2

Program: **Segments**
Date of Program Methodology: **1/3/1993**

What data types were used in the program methodology?

Crashes	*Exposure*	*Roadway*
All crashes	Traffic	Median width
Fatal crashes only	Volume	
		Horizontal curvature
		Functional classification
		Roadside features

What project identification methodology was used for this program?
Crash frequency

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?
Competitive application process
Other-RANKING

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).
Relative Weight in Scoring

Available funding	50
Cost Effectiveness	50

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

50%

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

Cable Median Barriers
Rumble Strips
Pavement/Shoulder Widening
Install/Improve Signing
Clear Zone Improvements
Other-Horizontal Curve Signing and Marking Program

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.

Systemic Approach

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

TSOS' methodology for development of the HSIP Programs is directly related to the correlation with the goals and elements in the Alabama Strategic Highway Safety Plan. Program elements are focused toward reducing the number of fatalities and severe injuries in Alabama.

ALDOT is making great strides toward implementing more systemic programs and providing safety tools for analysis for within the department as well as external partners. The goal for the updated SHSP is to target more local entities to assist in the TZD initiative for the state.

Progress in Implementing Projects

Funds Programmed

Reporting period for Highway Safety Improvement Program funding.

Federal Fiscal Year

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

Funding Category	Programmed*		Obligated	
HSIP (Section 148)	$21,922,741.00	3 %	$7,677,341.77	1 %
HRRRP (SAFETEA-LU)	$0.00	0 %	$0.00	0 %
HRRR Special Rule	$0.00	0 %	$0.00	0 %
Penalty Transfer - Section 154	$0.00	0 %	$0.00	0 %
Penalty Transfer – Section 164	$0.00	0 %	$0.00	0 %
Incentive Grants - Section 163	$0.00	0 %	$0.00	0 %

Incentive Grants (Section 406)	$0.00	0 %	$0.00	0 %
Other Federal-aid Funds (i.e. STP, NHPP)	$724,358,988.00	97 %	$721,505,794.05	99 %
State and Local Funds	$0.00	0 %	$0.00	0 %
Totals	$746,281,729.00	100%	$729,183,135.82	100%

How much funding is programmed to local (non-state owned and operated) safety projects?
$4,931,606.00
How much funding is obligated to local safety projects?
$4,931,606.00

How much funding is programmed to non-infrastructure safety projects?
$8,622,000.00
How much funding is obligated to non-infrastructure safety projects?
$8,622,000.00

How much funding was transferred in to the HSIP from other core program areas during the reporting period?
$0.00
How much funding was transferred out of the HSIP to other core program areas during the reporting period?
$21,813,412.00

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

At this time, there are no obligation impediments of HSIP funds in Alabama.

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

None at this time.

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
Traffic Signal Inventory Services-Statewide (Phase	Non-infrastructure Data/traffic records	1 Numbers	888577	888577	HSIP (Section 148)	N/A	0	0	State Highway Agency	Data	
ALDOT Safety Data access, sharing, display study	Non-infrastructure Data/traffic records	1 Numbers	203867	203867	HSIP (Section 148)	N/A	0	0	State Highway Agency	Data	
Dvlpmnt of Rdwy Congestion/Safety Improvement Tool	Non-infrastructure Data/traffic records	1 Numbers	0	294890	Penalty Transfer - Section 154	N/A	0	0	State Highway Agency	Data	
FY16 Safety Outreach Program	Non-infrastructure Educational efforts	1 Numbers	1000000	1000000	HSIP (Section 148)	N/A	0	0	State Highway Agency	Education	
Dvlpmnt of Highway Safety Workforce in AL Phase II	Non-infrastructure Training	1 Numbers	281673	281673	HSIP (Section 148)	N/A	0	0	State Highway Agency	Education	

	and workforce development										
ALDOT and ALEA Overtime Enforcement Efforts FY16	Non-infrastructure Non-infrastructure - other	1 Numbers	1500000	1500000	HSIP (Section 148)	N/A	0	0	State Highway Agency	Enforcement	
Development of AL Vulnerable Road Users Handbook	Non-infrastructure Transportation safety planning	1 Numbers	315502.97	315502.97	HSIP (Section 148)	N/A	0	0	State Highway Agency	Planning for all road users, including pedestrians, bicyclists, and drivers	
Wet Pavement Analysis Study	Non-infrastructure Data/traffic records	1 Numbers	86220	301267	Other Federal-aid Funds (i.e. STP, NHPP)	N/A	0	0	State Highway Agency	Data	
Horizontal Curves Safety Program (N, E.C., and W.C	Non-infrastructure Transportation safety planning	1 Numbers	1000000	1000000	HSIP (Section 148)	N/A	0	0	State Highway Agency	Data	
Horizontal Curves Safety Program (E.C., SW, and SE	Non-infrastructure Transportation safety	1 Numbers	1000000	1000000	HSIP (Section 148)	N/A	0	0	State Highway Agency	Data	

	planning										
Statewide Highway Safety Improvement Program	Non-infrastructure Transportation safety planning	1 Numbers	1050400	1050400	HSIP (Section 148)	N/A	0	0	State Highway Agency	Data	
2' Safety Widen/Resurface SR-8 MP236.66 to MP250.	Shoulder treatments Widen shoulder - paved or other	14.04 Miles	897506	4986198.64	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Major Collector	0	0	State Highway Agency	Lane Departure	
Resurfacing/2' Safety Widen SR-25 MP 232 to MP 236	Shoulder treatments Widen shoulder - paved or other	4.2 Miles	268921	2444734	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	
2' Safety Widen/Resurface SR-117 MP 38.27 to MP 50	Shoulder treatments Widen shoulder - paved or other	11.89 Miles	1054378	6202223.51	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Major Collector	0	0	State Highway Agency	Lane Departure	
2' Safety Widen/Resurface SR-1 MP 286.55 to MP 290	Shoulder treatments Widen shoulder - paved or	3.97 Miles	284752	2588656.63	Other Federal-aid Funds (i.e.	Rural Principal Arterial - Other	0	0	State Highway Agency	Lane Departure	

	other				STP, NHPP)						
Resurface/2' Safety Widen SR-3 MP 312.652 to MP 31	Shoulder treatments Widen shoulder - paved or other	4.558 Miles	446548	4961644.35	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Major Collector	0	0	State Highway Agency	Lane Departure	
Roundabout Feasibility Study in North Region (3 lo	Intersection traffic control Modify control - modifications to roundabout	3 Numbers	0	90000	Other Federal-aid Funds (i.e. STP, NHPP)	N/A	0	0	State Highway Agency	Data	
2' Safety Widen/Resurface SR-144 MP 0 to MP 10.16	Shoulder treatments Widen shoulder - paved or other	10.16 Miles	515660	3033295.25	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	
2' Sfty Wdn/Rsrfc/prm trffc stripe SR-25 MP 130.53	Shoulder treatments Widen shoulder - paved or other	7.82 Miles	372753	1589103	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	
Multi Safety Improvements SR-4 MP 111.91 to MP 114	Shoulder treatments Widen	2.83 Miles	176151	2516439.24	Other Federal-aid	Urban Major Collector	0	0	State Highway Agency	Multiple Safety Improveme	

	shoulder - paved or other				Funds (i.e. STP, NHPP)					nts	
2' Safety Widen/Resurface SR-53 MP 253.99 to MP 26	Shoulder treatments Widen shoulder - paved or other	8.64 Miles	511590	4263254.4	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Principal Arterial - Other	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-9 MP 230.170 to MP 23	Shoulder treatments Widen shoulder - paved or other	8.059 Miles	454114	3027625.26	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	
Interstate Median Barrier I-85 from Exit 50 to GA	Roadside Barrier - other	30.3 Miles	750380	2273878.74	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Principal Arterial - Interstate	0	0	State Highway Agency	Roadway Departure	
Resurface/2' Safety Widen SR-1 MP 158.446 to 161.6	Shoulder treatments Widen shoulder - paved or other	3.194 Miles	205801	1286256.11	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Principal Arterial - Other	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-21 MP	Shoulder treatments	5.738 Miles	482170	2055568	Other Federal	Rural Minor	0	0	State Highway	Lane Departure	

236.262 to MP 2	Widen shoulder - paved or other				-aid Funds (i.e. STP, NHPP)	Arterial			Agency		
Resurface/2' Safety Widen SR-63 and SR-22	Shoulder treatments Widen shoulder - paved or other	11.997 Miles	1067493	5211878	Other Federal -aid Funds (i.e. STP, NHPP)	Rural Minor Collector	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-22 MP 144.057-153.094	Shoulder treatments Widen shoulder - paved or other	9.037 Miles	893402	4702115.43	Other Federal -aid Funds (i.e. STP, NHPP)	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-1 MP 203.849-MP 212.2	Shoulder treatments Widen shoulder - paved or other	8.372 Miles	584298	3437047.83	Other Federal -aid Funds (i.e. STP, NHPP)	Rural Principal Arterial - Other	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-48 MP 15.682 to MP 25	Shoulder treatments Widen shoulder - paved or other	9.555 Miles	773503	3867513.5	Other Federal -aid Funds (i.e. STP, NHPP)	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	

Resurface/2' Safety Widen SR-1 MP 192.623-MP 195.4	Shoulder treatments Widen shoulder - paved or other	2.847 Miles	315935	1579677.44	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Principal Arterial - Other	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widening SR-275 MP 0.378-MP 3.	Shoulder treatments Widen shoulder - paved or other	2.695 Miles	214601	1216075	Other Federal-aid Funds (i.e. STP, NHPP)	Urban Principal Arterial - Other	0	0	State Highway Agency	Lane Departure	
Resurface/Safety Widen SR-25 MP 70.74 to MP 84.73	Shoulder treatments Widen shoulder - paved or other	14.03 Miles	1021841	6010831.5	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	
Plane/Resurface/2' Safety Widening SR-289 MP 0 - 1	Shoulder treatments Widen shoulder - paved or other	1.2 Miles	31718	1025544	Other Federal-aid Funds (i.e. STP, NHPP)	Urban Major Collector	0	0	State Highway Agency	Lane Departure	
Intrsctn Sfty Impr. 5th St.+SR-13, Main Ave-->Brid	Intersection geometry Intersection geometry - other	1 Numbers	400000	400000	HSIP (Section 148)	Urban Minor Arterial	0	0	State Highway Agency	Intersections	

Guardrail Installation I-85 MP 3.3 to MP 8.5	Roadside Barrier-metal	5.2 Miles	5200	15600	Other Federal-aid Funds (i.e. STP, NHPP)	Urban Principal Arterial - Interstate	0	0	State Highway Agency	Roadway Departure	
Resurface/Safety Widen SR-8 MP 174.667 to MP 181.2	Shoulder treatments Widen shoulder - paved or other	6.601 Miles	356895	3568945.83	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Principal Arterial - Other	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-15 MP 172.074-MP 176.	Shoulder treatments Widen shoulder - paved or other	4.235 Miles	384547	2563645.19	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Major Collector	0	0	State Highway Agency	Lane Departure	
Planing/Resurface/2' Sfty Widen SR-3 MP119.972--12	Shoulder treatments Widen shoulder - paved or other	5.478 Miles	447794	2798710.21	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Major Collector	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-106 MP 14.827 to MP 2	Shoulder treatments Widen shoulder - paved or other	5.803 Miles	418837	2792246.57	Other Federal-aid Funds (i.e. STP,	Rural Major Collector	0	0	State Highway Agency	Lane Departure	

					NHPP)						
Resurface/2' Safety Widen SR-6 MP 165.8 to MP 166.	Shoulder treatments Widen shoulder - paved or other	7.773 Miles	539455	4495457.56	Other Federal-aid Funds (i.e. STP, NHPP)	Urban Principal Arterial - Other	0	0	State Highway Agency	Lane Departure	
Resurface/2' Widen SR-63 MP 6.7 to MP 16.311	Shoulder treatments Widen shoulder - paved or other	9.611 Miles	447833	2985552.8	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	
Roadside Hardware Assessment Pilot Program	Roadside Roadside - other	1 Numbers	418771	418771	HSIP (Section 148)	N/A	0	0	State Highway Agency	Data	
Guardrail Installation on I-85 MP 3.3 to MP 6.4	Roadside Barrier-metal	3.1 Miles	98164	98163.75	HSIP (Section 148)	Urban Principal Arterial - Interstate	0	0	State Highway Agency	Lane Departure	
Safety Project-Correct Cross Slope SR-1 MP 50.10--	Roadway Superelevation / cross slope	0.191 Miles	331513	331512.64	HSIP (Section 148)	Rural Principal Arterial - Other	0	0	State Highway Agency	Roadway Geometry	
Resurface/2' Safety Widen SR-131 MP 17.9 to MP 27.	Shoulder treatments Widen shoulder - paved or other	9.225 Miles	734307	3496699.86	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Major Collector	0	0	State Highway Agency	Lane Departure	

Resurface/2' Safety Widen SR-131 MP 8.052 to MP 17	Shoulder treatments Widen shoulder - paved or other	9.848 Miles	855688	3565364.71	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Major Collector	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-122 MP 0 to MP 3.777	Shoulder treatments Widen shoulder - paved or other	3.777 Miles	223872	1865597.69	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Major Collector	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-239 MP 2.166 to MP 7.	Shoulder treatments Widen shoulder - paved or other	4.972 Miles	450826	2817661.67	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Major Collector	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-125 MP 13.58 to MP 19	Shoulder treatments Widen shoulder - paved or other	5.795 Miles	456613	2536739.84	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-93 MP 2.783 to MP 8.3	Shoulder treatments Widen shoulder - paved or other	5.608 Miles	433841	1807669.75	Other Federal-aid Funds (i.e. STP,	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	

					NHPP)						
Resurface/2' Safety Widen SR-201 MP 0.02 to MP 1.5	Shoulder treatments Widen shoulder - paved or other	1.517 Miles	408102	536976.15	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Major Collector	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-12 MP 127.327--131.62	Shoulder treatments Widen shoulder - paved or other	4.4 Miles	69809	3490429.79	Other Federal-aid Funds (i.e. STP, NHPP)	Urban Principal Arterial - Other	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-27 MP 36.661 to MP 44	Shoulder treatments Widen shoulder - paved or other	7.993 Miles	621159	2484637.84	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	
Resurface/2' Safety Widen SR-52 MP 65.14 to MP 74.	Shoulder treatments Widen shoulder - paved or other	9.389 Miles	689276	2996853.2	Other Federal-aid Funds (i.e. STP, NHPP)	Urban Principal Arterial - Other	0	0	State Highway Agency	Lane Departure	
2' Sfty Widen/Planing/Resurface SR-10 MP45.695--53	Shoulder treatments Widen shoulder -	7.804 Miles	558405	2233619.09	Other Federal-aid Funds	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	

	paved or other				(i.e. STP, NHPP)						
2' Safety Widen/Resurface SR-69 MP 48.63 to MP 54.	Shoulder treatments Widen shoulder - paved or other	5.815 Miles	424528	1463888.38	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Major Collector	0	0	State Highway Agency	Lane Departure	
2' Safety Widen/Resurface SR-21 MP 71.947 to MP 78	Shoulder treatments Widen shoulder - paved or other	7 Miles	627912	2511649.54	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	
2' Safety Widen/Resurface SR-12 MP 28.065 to MP 36	Shoulder treatments Widen shoulder - paved or other	8.09 Miles	640839	2288710.63	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Principal Arterial - Other	0	0	State Highway Agency	Lane Departure	
2' Sfty Widen/Planing/Resurface SR-164 MP 0.092--2	Shoulder treatments Widen shoulder - paved or other	2.459 Miles	126041	787753.65	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Major Collector	0	0	State Highway Agency	Lane Departure	
2' Safety Widen/Resurfacing SR-221 MP 0.030 to	Shoulder treatments Widen	1.814 Miles	124289	690493.86	Other Federal-aid	Rural Minor Arterial	0	0	State Highway Agency	Lane Departure	

MP	shoulder - paved or other				Funds (i.e. STP, NHPP)						
2' Sfty Widen/Planing/Resurface SR-5 MP 11.240--21	Shoulder treatments Widen shoulder - paved or other	9.959 Miles	847639	3027283.22	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Principal Arterial - Other	0	0	State Highway Agency	Lane Departure	
2' Sfty Widen/Planing/Resurface SR-5 MP 21.199--28	Shoulder treatments Widen shoulder - paved or other	6.882 Miles	545220	2180881.55	Other Federal-aid Funds (i.e. STP, NHPP)	Rural Principal Arterial - Other	0	0	State Highway Agency	Lane Departure	
Guide Rail Installation I-59 MP 27.292 to MP 55.35	Roadside Barrier - cable	28.06 Miles	388294	388294.41	HSIP (Section 148)	Rural Principal Arterial - Interstate	0	0	State Highway Agency	Roadway Departure	

Progress in Achieving Safety Performance Targets

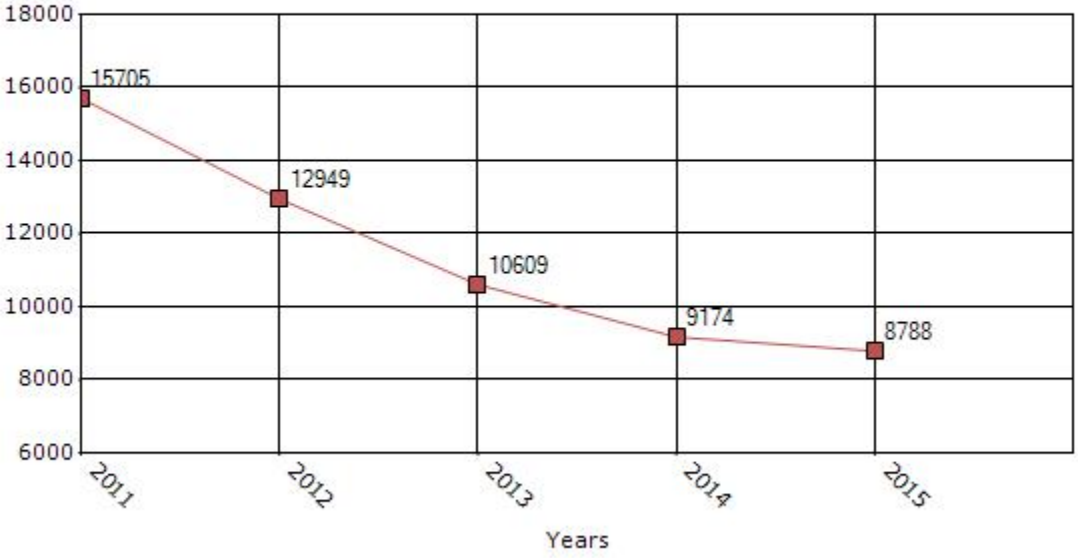
Overview of General Safety Trends

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

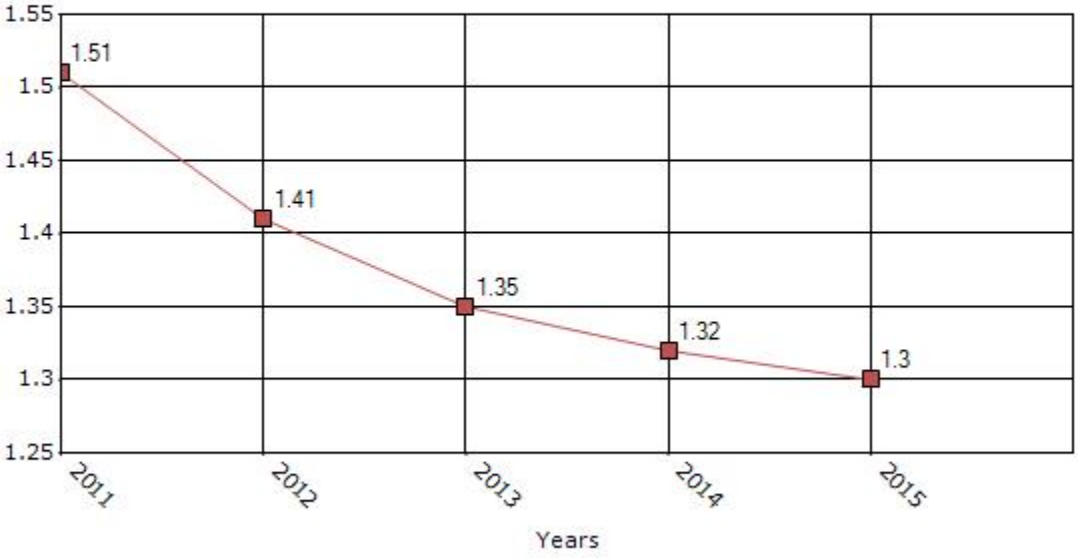
Performance Measures*	2011	2012	2013	2014	2015
Number of fatalities	937	888	864	859	856
Number of serious injuries	15705	12949	10609	9174	8788
Fatality rate (per HMVMT)	1.51	1.41	1.35	1.32	1.3
Serious injury rate (per HMVMT)	25.26	20.59	16.57	14.11	13.32

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

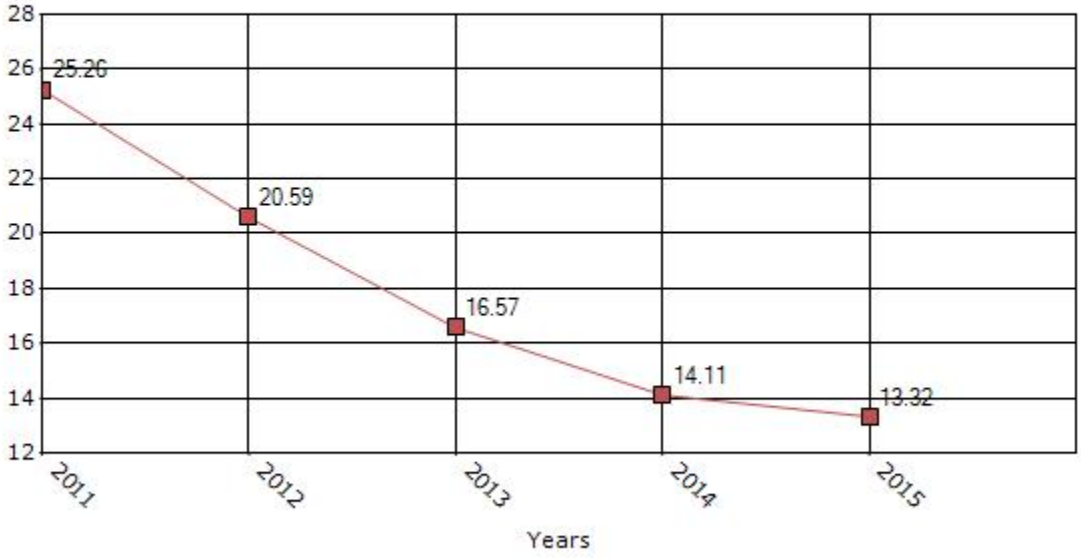
Number of Serious Injuries for the Last Five Years
5-yr Average Measure Data



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



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

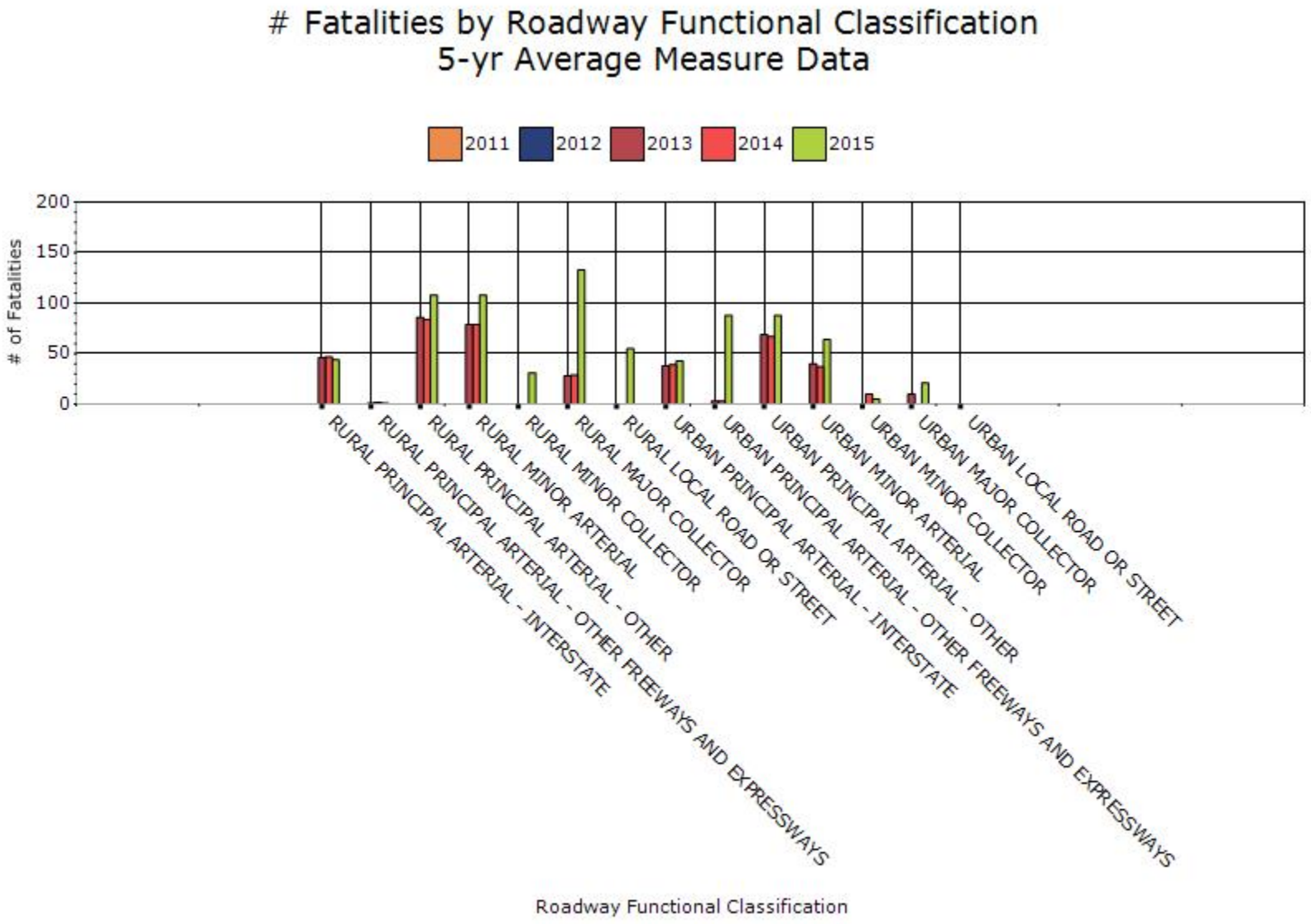


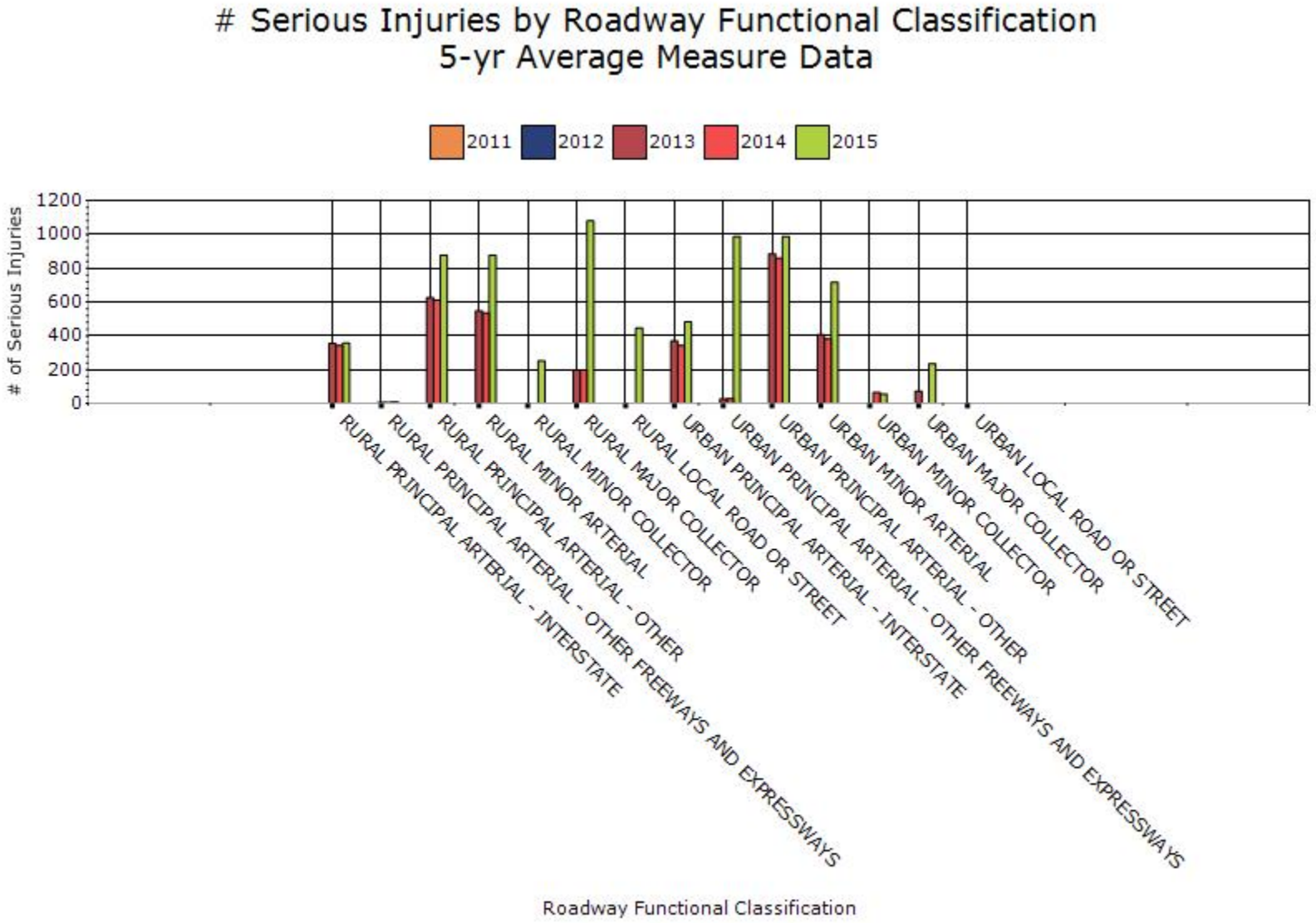
To the maximum extent possible, present performance measure* data by functional classification and ownership.

Year - 2015

Function Classification	Number of fatalities	Number of serious injuries	Fatality rate (per HMVMT)	Serious injury rate (per HMVMT)
RURAL PRINCIPAL ARTERIAL - INTERSTATE	44	357		
RURAL PRINCIPAL ARTERIAL - OTHER FREEWAYS AND EXPRESSWAYS	1	8		
RURAL PRINCIPAL ARTERIAL - OTHER	108	877		
RURAL MINOR ARTERIAL	108	877		
RURAL MINOR COLLECTOR	31	252		
RURAL MAJOR COLLECTOR	133	1080		
RURAL LOCAL ROAD OR STREET	55	447		
URBAN PRINCIPAL ARTERIAL - INTERSTATE	43	482		

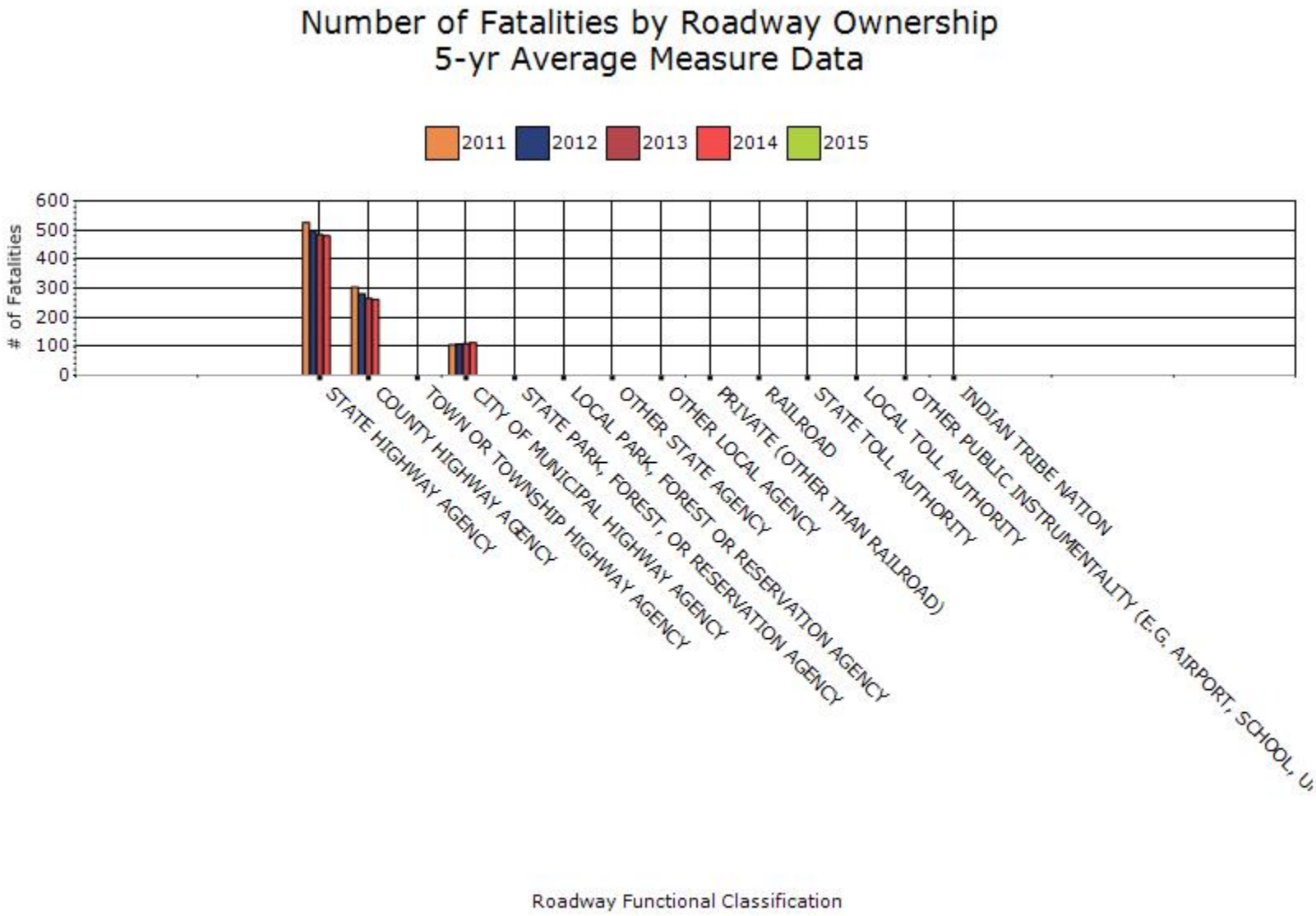
URBAN PRINCIPAL ARTERIAL - OTHER FREEWAYS AND EXPRESSWAYS	88	987		
URBAN PRINCIPAL ARTERIAL - OTHER	88	987		
URBAN MINOR ARTERIAL	64	718		
URBAN MINOR COLLECTOR	5	56		
URBAN MAJOR COLLECTOR	21	236		

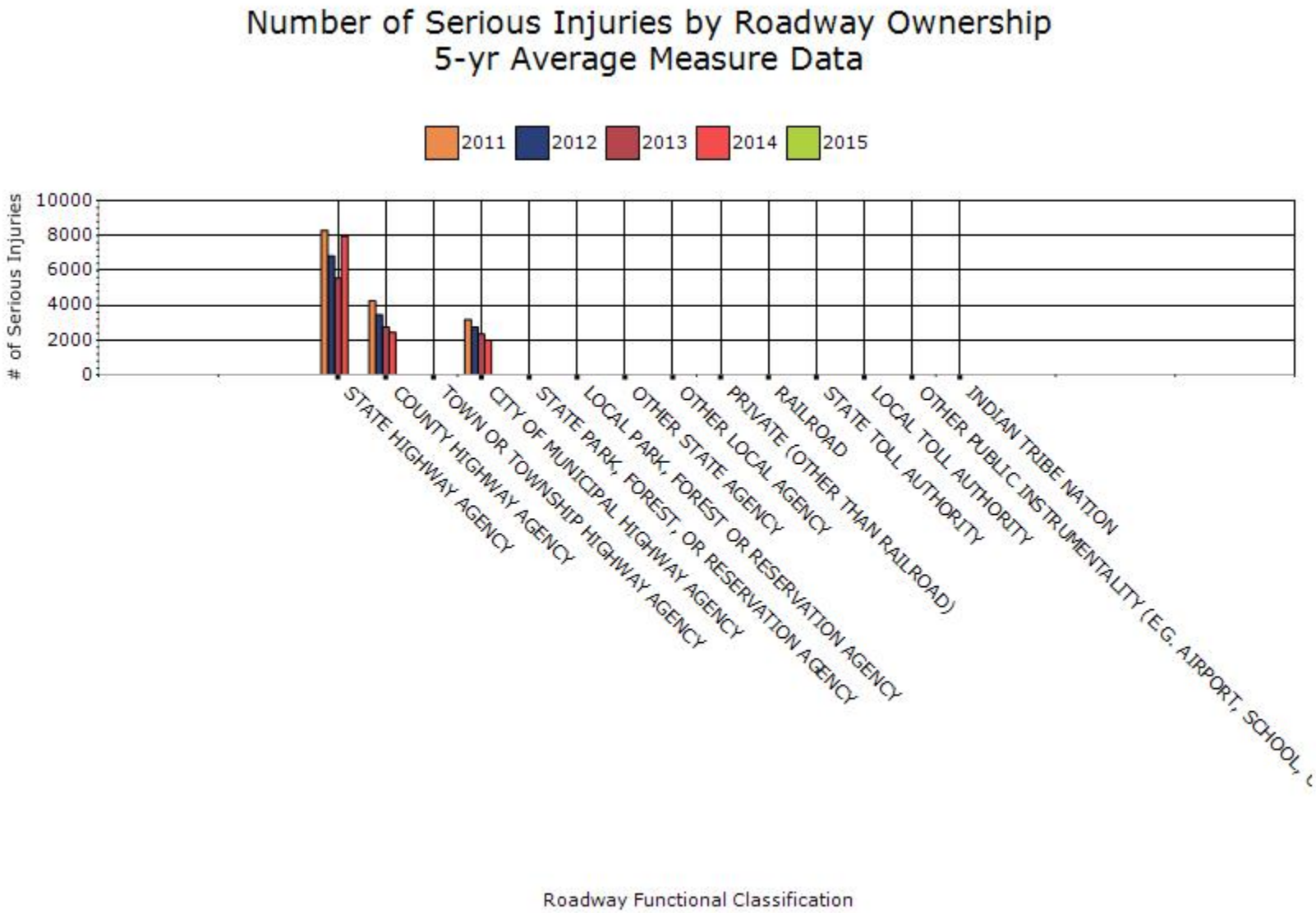

Fatalities by Roadway Functional Classification
5-yr Average Measure Data
2011
2012
2013
2014
2015
200
150
100
50
0
# of Fatalities
RURAL PRINCIPAL ARTERIAL - INTERSTATE
RURAL PRINCIPAL ARTERIAL - OTHER FREEWAYS AND EXPRESSWAYS
RURAL PRINCIPAL ARTERIAL - OTHER
RURAL MINOR ARTERIAL
RURAL MINOR COLLECTOR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


Serious Injuries by Roadway Functional Classification
5-yr Average Measure Data
2011
2012
2013
2014
2015
# of Serious Injuries
1200
1000
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
Roadway Functional Classification

Year - 2014

Roadway Ownership	Number of fatalities	Number of serious injuries	Fatality rate (per HMVMT)	Serious injury rate (per HMVMT)
STATE HIGHWAY AGENCY	480	7971		
COUNTY HIGHWAY AGENCY	261	2449		
CITY OF MUNICIPAL HIGHWAY AGENCY	113	1997		


Number of Fatalities by Roadway Ownership
5-yr Average Measure Data
2011
2012
2013
2014
2015
# of Fatalities
600
500
400
300
200
100
0
STATE HIGHWAY AGENCY
COUNTY HIGHWAY AGENCY
TOWN OR TOWNSHIP HIGHWAY AGENCY
CITY OF MUNICIPAL HIGHWAY AGENCY
STATE PARK, FOREST, OR RESERVATION AGENCY
LOCAL PARK, FOREST OR RESERVATION AGENCY
OTHER STATE AGENCY
OTHER LOCAL AGENCY
PRIVATE (OTHER THAN RAILROAD)
RAILROAD
STATE TOLL AUTHORITY
LOCAL TOLL AUTHORITY
OTHER PUBLIC INSTRUMENTALITY (E.G. AIRPORT, SCHOOL, U
INDIAN TRIBE NATION
Roadway Functional Classification


Number of Serious Injuries by Roadway Ownership
5-yr Average Measure Data
2011
2012
2013
2014
2015
# of Serious Injuries
10000
8000
6000
4000
2000
0
STATE HIGHWAY AGENCY
COUNTY HIGHWAY AGENCY
TOWN OR TOWNSHIP HIGHWAY AGENCY
CITY OF MUNICIPAL HIGHWAY AGENCY
STATE PARK, FOREST, OR RESERVATION AGENCY
LOCAL PARK, FOREST OR RESERVATION AGENCY
OTHER STATE AGENCY
OTHER LOCAL AGENCY
PRIVATE (OTHER THAN RAILROAD)
RAILROAD
STATE TOLL AUTHORITY
LOCAL TOLL AUTHORITY
OTHER PUBLIC INSTRUMENTALITY (E.G. AIRPORT, SCHOOL,
INDIAN TRIBE NATION
Roadway Functional Classification

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

Alabama has had a steady decline in both the number of fatalities and the number of serious injuries. This year's report shows a continuing decline also.

Alabama is still incorporating highway functional class into the crash data system administered through the CARE system. The rolling average for 2015 was calculated for this report. However the rate of fatalities and serious injuries for highway functional classification and/or roadway classification is still not available

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)	0.15	0.15	0.15	0.16	0.15
Serious injury rate (per capita)	2.05	1.74	1.43	1.21	1.14
Fatality and serious injury rate (per capita)	2.2	1.89	1.58	1.37	1.3

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

The number of fatalities for drivers and pedestrians 65 years of age and older from the FARS annual Report File and the number of serious injuries from Alabama's CARE system are added together. That amount is then divided by the number of people in Alabama who are 65 years of age and older compared to the total State population to determine the rate for that particular year, i.e. 2005.

Example: For 2005: (No. of Fatalities + No. of Serious Injuries) = Total of Older Driver and Pedestrians for 2005

Total of Older Drivers and Pedestrians for 2005 / 2005 older population =RATE FOR 2005

In order to calculate the 5 year rolling averages, each rate of fatalities and serious injuries was calculated for each year 2005, 2006, 2007, 2008, 2009, 2010, 2011, 2012, 2013. Then a 5 year rolling average is calculated as below.

Example:

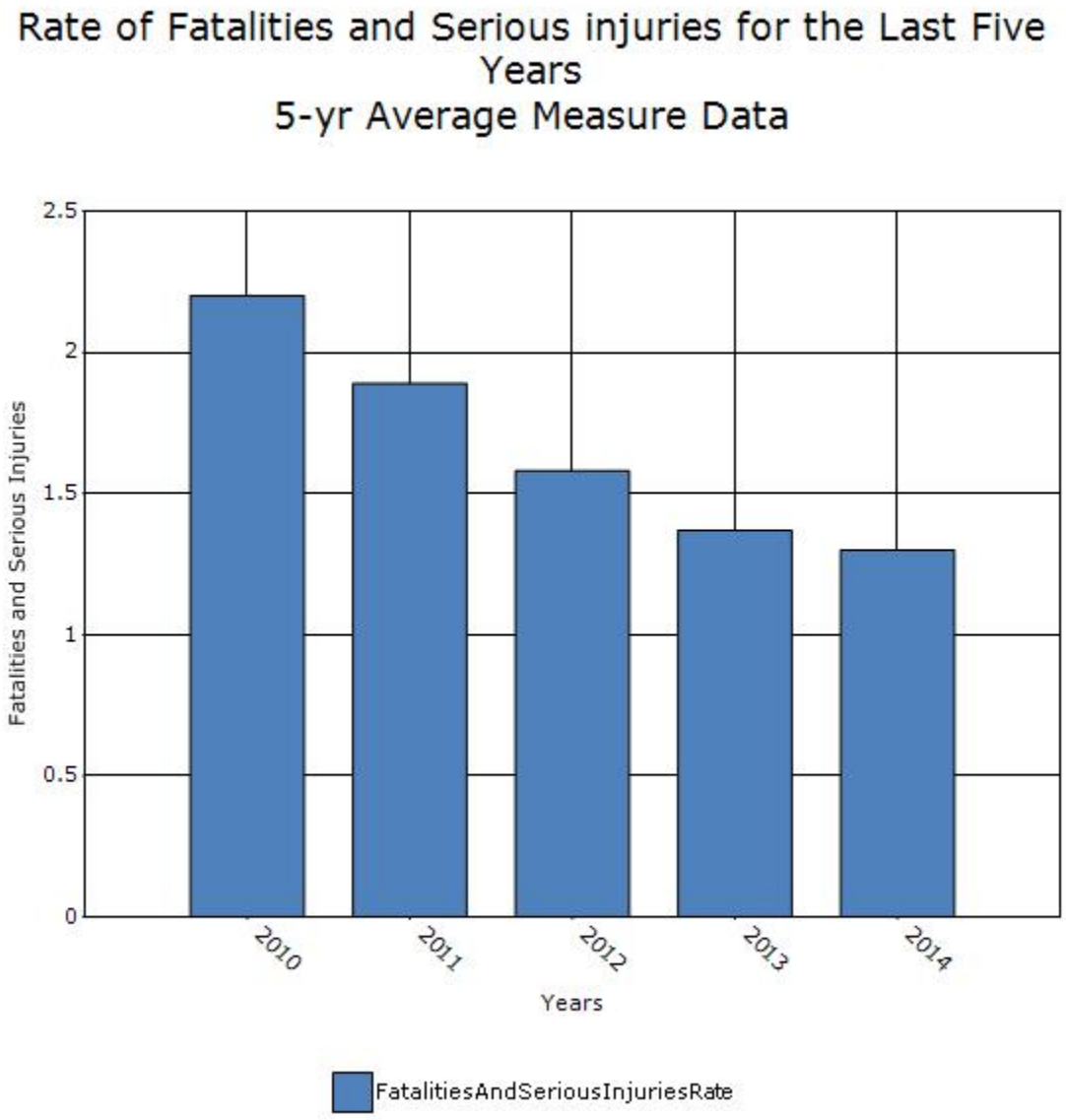
(2005 RATE) + (2006 RATE)+ (2007 RATE) +(2008 RATE) +(2009 RATE) /5= ROLLING AVERAGE FOR 2009

(2006 RATE) + (2007 RATE)+ (2008 RATE) +(2009 RATE) +(2010 RATE) /5= ROLLING AVERAGE FOR 2010

(2007 RATE) + (2008 RATE) + (2009 RATE) +(2010 RATE) +(2011 RATE) /5= ROLLING AVERAGE FOR 2011

(2008 RATE) + (2009 RATE) + (2010 RATE) +(2011 RATE) +(2012 RATE) /5= ROLLING AVERAGE FOR 2012

(2009 RATE) + (2010 RATE) + (2011 RATE) +(2012 RATE) +(2013 RATE) /5= ROLLING AVERAGE FOR 2013



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.

Varies by project type.

A Benefit/Cost ratio is assigned to all non-systemic projects. This ratio is calculated using the ALDOT HSIP spreadsheet and is used to determine if a project will move forward with safety funds, be denied funding, or be split funded in some cases. The current minimum B/C ratio is 1.0, but may be moved higher as more projects are submitted for HSIP funding.

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.

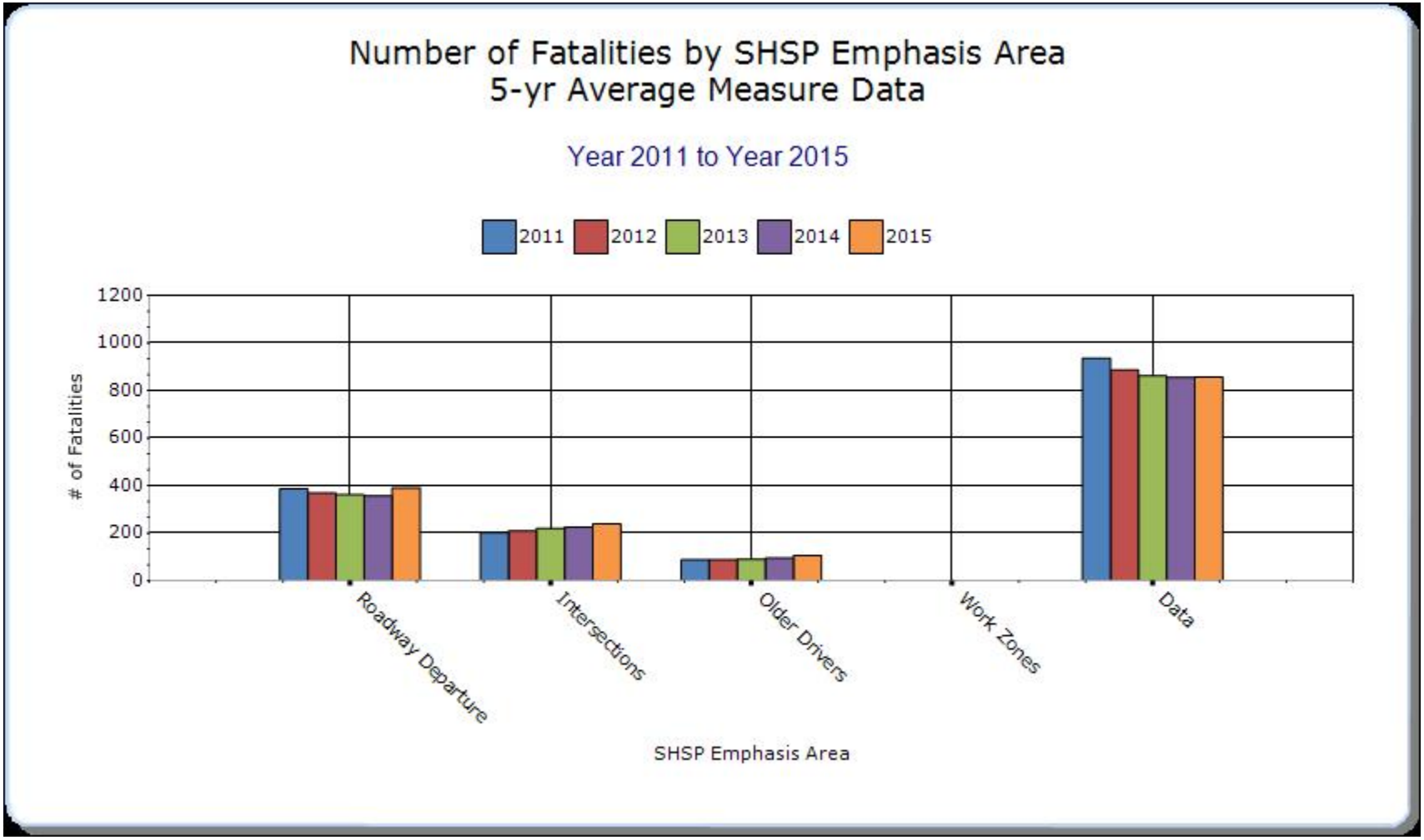
No significant program changes have occurred since the last report.

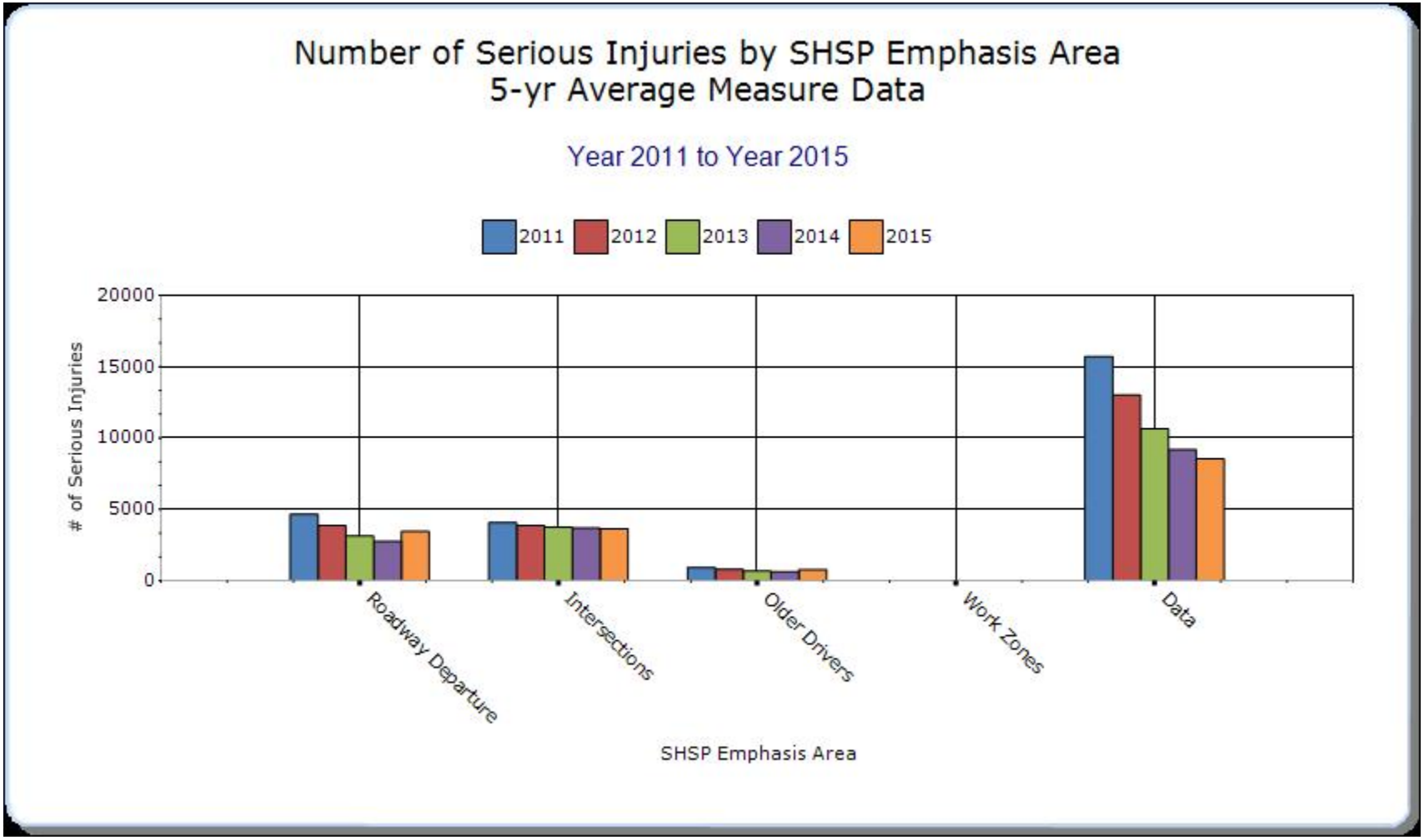
SHSP Emphasis Areas

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	Run-off-road	391	3457					
Intersections	Intersections	239	3650					
Older Drivers	All	106	784					
Data	All	857	8540					


Number of Fatalities by SHSP Emphasis Area
5-yr Average Measure Data
Year 2011 to Year 2015
2011
2012
2013
2014
2015
1200
1000
800
600
400
200
0
# of Fatalities
Roadway Departure
Intersections
Older Drivers
Work Zones
Data
SHSP Emphasis Area

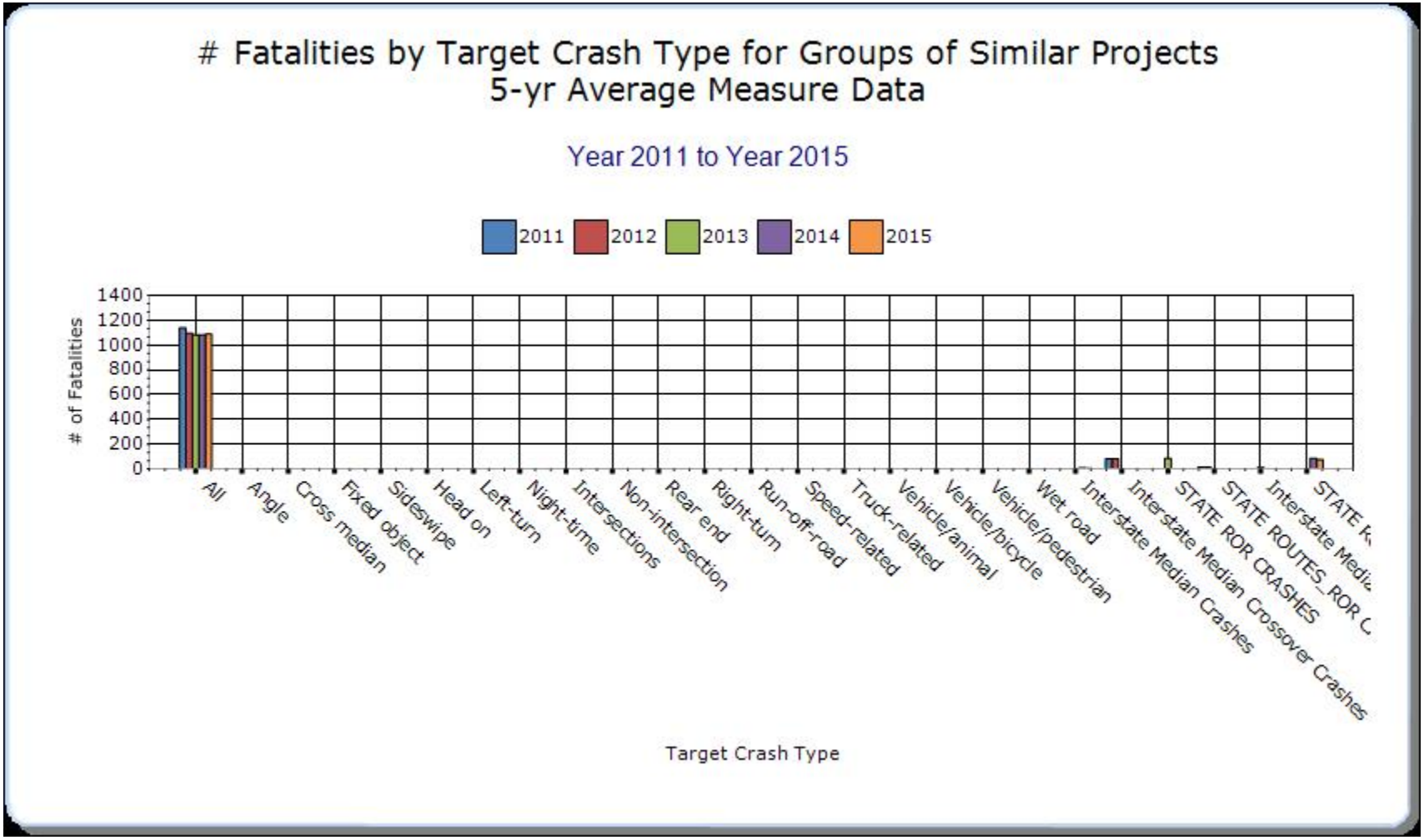


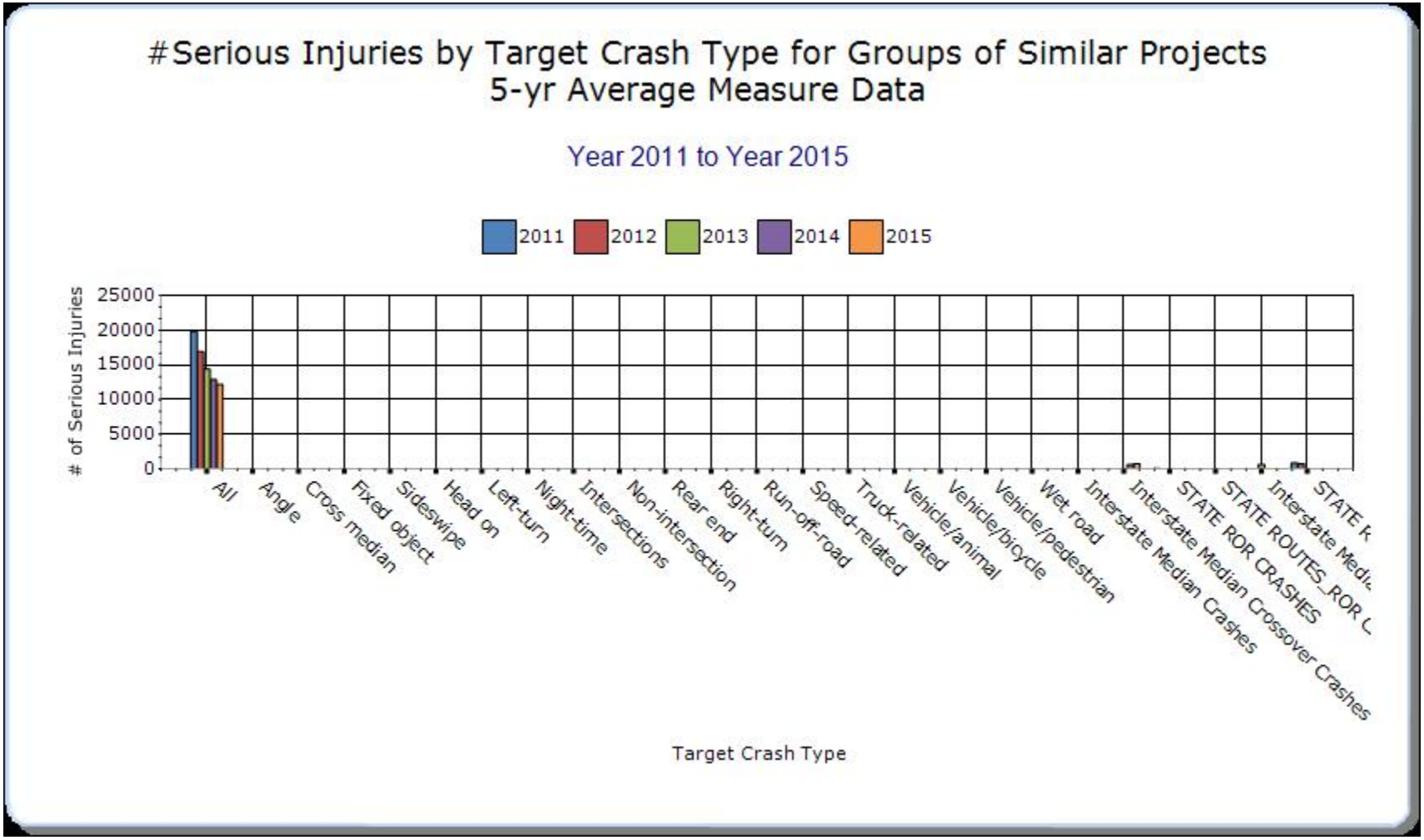
Groups of similar project types

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
Roadway Departure	STATE ROUTE_ROR	76	744					
Median Barrier	Interstate Median Barrier	6	22					
Crash Data	All	849	8540					
Intersection	All	239	3650					


Fatalities by Target Crash Type for Groups of Similar Projects
5-yr Average Measure Data
Year 2011 to Year 2015
2011
2012
2013
2014
2015
# of Fatalities
1400
1200
1000
800
600
400
200
0
All
Angle
Cross median
Fixed object
Sideswipe
Head on
Left-turn
Night-time
Intersections
Non-intersection
Rear end
Right-turn
Run-off-road
Speed-related
Truck-related
Vehicle/animal
Vehicle/bicycle
Vehicle/pedestrian
Wet road
Interstate Median Crashes
Interstate Median Crossover Crashes
STATE ROR CRASHES
STATE ROUTES_ROR C
Interstate Media
STATE R
Target Crash Type

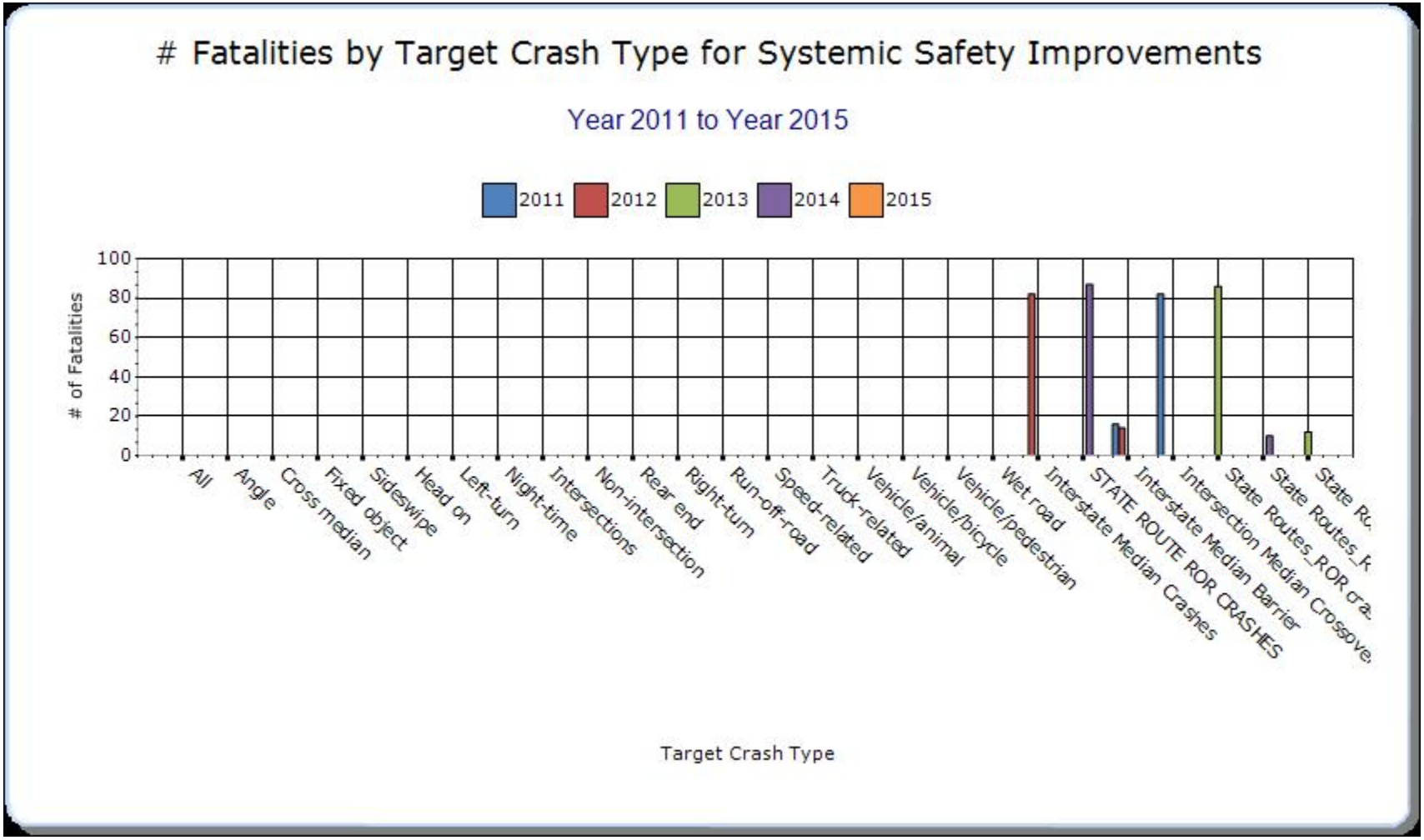


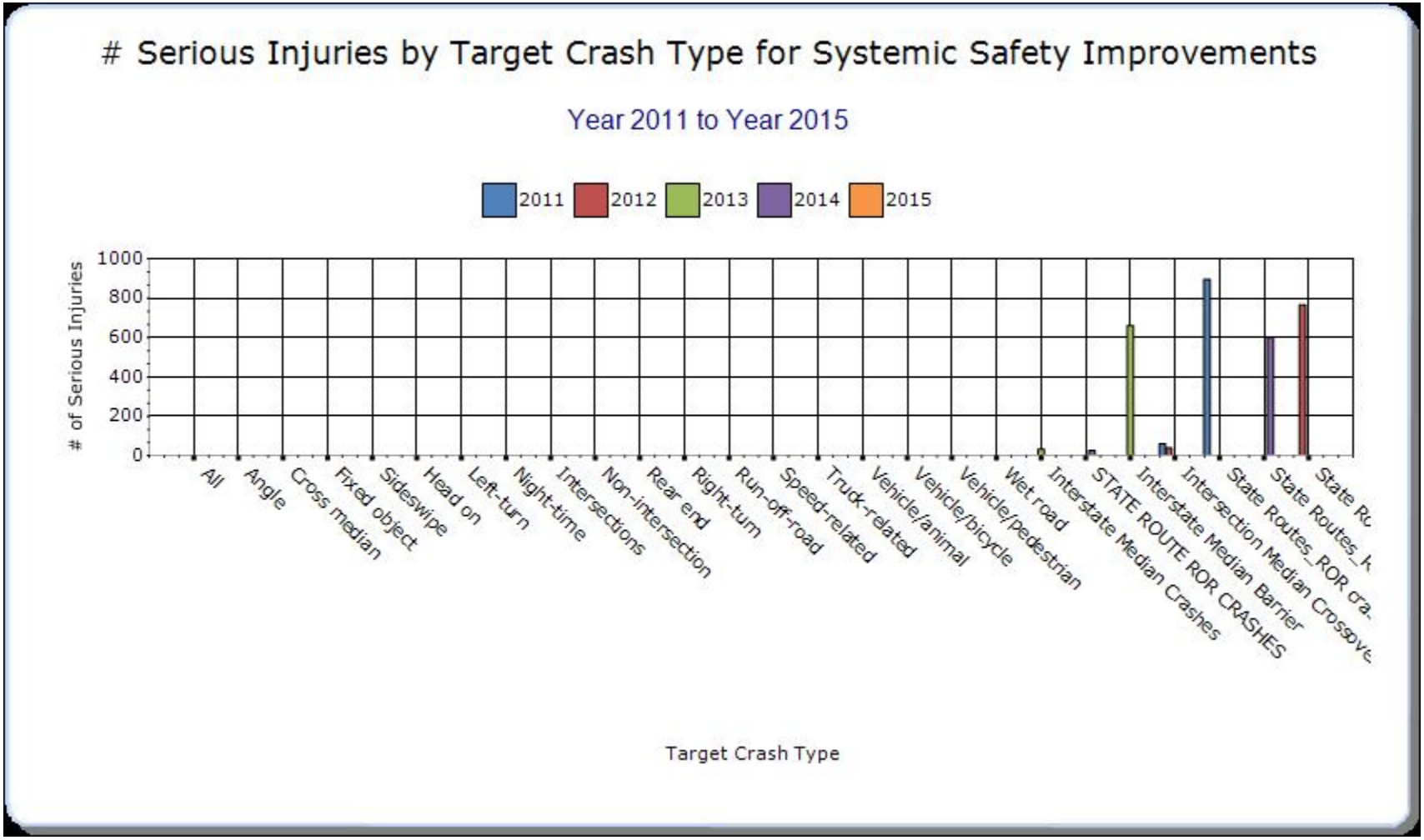
Systemic Treatments

Present the overall effectiveness of systemic treatments.

Year - 2014

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
Cable Median Barriers	Interstate Median Barrier	10	27					
Pavement/Shoulder Widening	State Routes	87	601					


Fatalities by Target Crash Type for Systemic Safety Improvements
Year 2011 to Year 2015
2011
2012
2013
2014
2015
# of Fatalities
100
80
60
40
20
0
All
Angle
Cross median
Fixed object
Sideswipe
Head on
Left-turn
Night-time
Intersections
Non-intersection
Rear end
Right-turn
Run-off-road
Speed-related
Truck-related
Vehicle/animal
Vehicle/bicycle
Vehicle/pedestrian
Wet road
Interstate Median Crashes
STATE ROUTE ROR CRASHES
Interstate Median Barrier
Intersection Median Crossove
State Routes_ROR cra
State Routes_R
State Rc
Target Crash Type


Serious Injuries by Target Crash Type for Systemic Safety Improvements
Year 2011 to Year 2015
2011
2012
2013
2014
2015
# of Serious Injuries
1000
800
600
400
200
0
All
Angle
Cross median
Fixed object
Sideswipe
Head on
Left-turn
Night-time
Intersections
Non-intersection
Rear end
Right-turn
Run-off-road
Speed-related
Truck-related
Vehicle/animal
Vehicle/bicycle
Vehicle/pedestrian
Wet road
Interstate Median Crashes
STATE ROUTE ROR CRASHES
Interstate Median Barrier
Intersection Median Crossove
State Routes_ROR cra
State Routes_H
State Ro
Target Crash Type

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

ALDOT has been integrating the Highway Safety Manual (HSM), Critical Analysis Report Environment (CARE), GIS and roadway inventory into the various safety programs to improve safety data collection and analysis. There is also a study nearing completion on "Integrating Safety and Operations into Planning, Design, Construction, and Post Construction Operations." This study includes research methodology and data collection, creates an environment for integrating operations and safety into multimodal planning efforts, reviews statewide, regional, corridor and sub-areas opportunities, then will conclude with a final workshop and study documentations.

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)
AL-10 from MP 46.69 to MP 53.49	Rural Minor Arterial	Shoulder treatments	Widen shoulder - paved or other			1		1				2	2	
AL-69 from MP 48.63 to MP 54.45	Rural Major Collector	Shoulder treatments	Widen shoulder - paved or other			2		2				2	2	

AL-21 from MP 71.94 to MP 78.95	Rural Minor Arterial	Shoulder treatments	Widen shoulder - paved or other		1	1	1	3		1	1		2	
AL-12 from MP 28.06 to MP 36.16	Rural Principal Arterial - Other	Shoulder treatments	Widen shoulder - paved or other		1	6		7						
AL-164 from MP 0.09 to MP 2.55	Rural Major Collector	Shoulder treatments	Widen shoulder - paved or other				2	2						
AL-221 from MP 0.03 to MP 1.85	Rural Minor Arterial	Shoulder treatments	Widen shoulder - paved or other		1	1		2						

AL-5 from MP 11.24 to MP 21.12	Rural Principal Arterial - Other	Shoulder treatments	Widen shoulder - paved or other				4	4						
AL-5 from MP 21.19 to MP 28.08	Multiple Functional Classes	Shoulder treatments	Widen shoulder - paved or other		2	6	6	14						
AL-1 from MP 50.1 to MP 50.29	Rural Principal Arterial - Other	Roadway	Superelevation / cross slope											

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.