Vehicle crashes are among some of our Nation’s most serious social, economic and health issues. In 2012, for example, vehicle crashes accounted for more than 30,000 deaths, two million injuries, and $230 billion in economic losses. What can be done to reduce these numbers?

The Highway Safety Improvement Program, or HSIP, is a Federal-aid program that helps reduce traffic fatalities and serious injuries on all public roadways. The HSIP provides more than $2 billion each year for the implementation of highway safety improvement projects and is a valuable resource to support your agency’s safety management.

Each State department of transportation, or State DOT, prepares a Strategic Highway Safety Plan (SHSP). The State DOT consults with a wide range of stakeholders that represent the four Es of roadway safety: engineering, education, enforcement and emergency medical services. The State must then regularly evaluate and update the plan to obtain HSIP funds.

The SHSP is a collaborative effort that ensures all stakeholders contribute to the plan’s development and implementation. The partners usually include a governor’s representative, regional and metropolitan planning organization members, and representatives of major transportation modes. State and local traffic enforcement officials, local agency transportation officials and many other organizations with a stake in roadway safety are also contributors.
The SHSP describes the mission and goals of the state’s highway safety efforts. The plan also outlines the resources, strategies and actions needed to meet the mission and goals. Stakeholders use a data-driven process and consider four-E solutions to develop strategies that address safety.

The SHSP guides the State’s roadway safety management.

The safety management process has three stages. The first stage is planning. Every step in planning combines two approaches: site analysis and systemic considerations. A site analysis identifies high-crash locations and the types of crashes that occur in those locations.

The planning stage identifies problems, develops countermeasures, and prioritizes projects for implementation. The planning stage results in a list of projects that meet HSIP requirements. This project list is incorporated into what is known as the State Transportation Improvement Program, or STIP, a list and description of projects that a State intends to advance.

The systemic approach to safety identifies high-risk roadway characteristics that are correlated with particular severe crash types. Transportation professionals apply systemic solutions to specific corridors or to the highway network as a whole.

The second stage in a safety improvement program is implementation. Priority projects
Federal-aid Essentials for Local Public Agencies

are scheduled and completed using available resources.

The third stage is evaluation to examine the effectiveness of completed highway safety improvement projects. The evaluation results give data and information about design parameters that cycle back into the planning stage to influence future highway safety improvement projects.

Highway safety improvement projects must meet eligibility requirements to qualify for funding. The HSIP spells out general eligibility criteria. State DOTs develop their highway safety improvement program based on the general HSIP eligibility criteria and the State’s specific approach to highway safety.

Here is an example of how a county created an action plan that aligned with the State’s SHSP. Many of the roads in Auburn County have sharp curves. The roads are former wagon trails and had been transformed over time without addressing roadway alignment, clear zones or lighting. Consequently, many road departure crashes at curves occur throughout the county.

Auburn County sought information from road department staff, the sheriff’s department and residents to supplement available data.

The county developed a Curve Action Plan and identified high-risk locations. A consultant analyzed the critical locations and recommended systemic countermeasures. The county’s Curve Action Plan aligned with the SHSP because of its focus on roadway departure crashes along curves.

The county received funding and implemented low-cost strategies, such as warning signs, chevron signing, and raised pavement markers. The county even added non-traditional “curve ahead” pavement markings, including directional arrows as a
way to warn drivers. The cost totaled less than $10,000.

The signs and pavement markings reduced the run-off-the-road crashes at the treated locations by 90 percent.

The HSIP is a valuable resource to support your safety management. The HSIP uses a systematic and repeatable process, resulting in defensible decisions. Many local agencies have taken advantage of this opportunity – How about your agency?

For additional information on funding, training and technical assistance to develop highway safety improvement projects, contact your State DOT, the Local Technical Assistance Program center, or the FHWA division office in your State.
The content of this document is not a substitute for information obtained from State departments of transportation, appropriate FHWA Division Offices, and applicable laws. Scenarios have been simplified for emphasis and do not necessarily reflect the actual range of requirements applicable to the scenario or this topic. This document was created under contract number DTFH61-11-D-00026 by the Federal Highway Administration, U.S. Department of Transportation, and is offered to the public to heighten and focus awareness of Federal-aid requirements within the local public agencies community and reinforces the importance of these necessary policies, procedures, and practices.

This Companion Resource is the script content for the video production of the same name.