Connecticut Local Road Safety Plans

Of the 21,000 miles of roadway in Connecticut, 82% are maintained by local municipal agencies. In 2013, 50% of roadway departure injury crashes and 26% of fatal crashes occurred on Connecticut’s local roads. To make significant progress in reducing the number of crashes, serious injuries, and fatalities in Connecticut, the safety along local roadways needs to improve.

Connecticut has a comprehensive safety plan that provides a framework for reducing highway fatalities and serious injuries on all public roads; this is known as the Connecticut Strategic Highway Safety Plan (SHSP). The SHSP can assist local practitioners in addressing safety on local roads but a locally-focused plan is often needed to address the unique conditions that contribute to safety problems and to assist local practitioners in making informed safety investment decisions. These challenges faced by local agencies can be addressed through the creation of a Local Roads Safety Plan (LRSP).
A LRSP is a locally-coordinated safety plan that provides a comprehensive framework to identify key safety needs and guide safety investment decisions on local roads. A LRSP provides an excellent opportunity for agencies at all levels of government (local, state, and federal) and other stakeholders to work together to align and leverage resources and funding to address the safety challenges unique to rural roads.

The LRSP development process involves six steps:

**Step 1: Establish Leadership**

Successful development of a LRSP depends on fostering leadership and communication among various stakeholders. This can start with the identification of a safety champion. The safety champion advocates for the plan’s successful development, implementation, and evaluation. It is also important to establish an LRSP working group. This is the team responsible for developing the LRSP, performing duties ranging from defining each working group member’s role to tracking progress after the initial plan is developed. Potential stakeholders could be: Chief Elected Official, Director of Public Works, Town Engineer, Road Supervisor, Chief of Police, and Fire Chief.

**Step 2: Analyze Safety Data**

Local road practitioners should analyze any available safety data to identify problem areas that will be addressed in the LRSP. Crash data should be used to identify safety issues. Typically, three years of crash data are needed to average out those years of extreme numbers. Connecticut’s Crash Data Repository (CDR) is a great tool to help local agencies gather and analyze crash data. The repository can be found at: [www.ctcrash.uconn.edu](http://www.ctcrash.uconn.edu)

If crash data is not readily available, other safety-related data or crash risk assessments can help identify safety issues and concerns. Other data may include traffic citations, hospital records, insurance claims, speeds, traffic counts, and in some cases anecdotal evidence from safety partners.
**Step 3: Determine Emphasis Areas**

The working group should identify emphasis areas consistent with trends identified during the data analysis and the concerns of the various stakeholders. If data is unavailable, emphasis areas may address concerns of the various stakeholders and the community. Local citizens should be given the chance to identify areas of concern. Methods to reach out to citizens may include public forums, open-house meetings, an internet survey, or via a request for comments advertised in the local newspaper.

Some examples of emphasis areas include pedestrians, intersections, roadway departure, impaired driving, distracted driving, aggressive driving, commercial motor vehicles, motorcycles, and improving data.

**Step 4: Identify Strategies**

Strategies to address emphasis areas should consider the 4 E’s (engineering, enforcement, education and emergency services) to comprehensively address safety. Strategies will be based on identifying, categorizing, and reviewing high-priority corridors or intersections for improvements. These are locations where safety improvements are most needed to achieve the goals in the LRSP and can form the basis for system-wide improvement strategies.

**Step 5: Prioritize and Incorporate Strategies**

The proposed strategies for each key emphasis area should be prioritized by comparing the benefits and costs of implementation. This comparison can help the implementation phase by starting with the strategies that provide the highest benefit (e.g., reduction in crashes) for the least cost. However, costs and benefits are not the only considerations. Other considerations for prioritization include the availability of manpower, the schedule for implementation, and the relative importance of each emphasis area. The working group can determine an agreed upon priority for the strategy with these considerations in mind.
**Step 6: Evaluate and Update the LRSP**

LRSPs should be monitored for progress to ensure implementation of strategies that support emphasis areas and to determine if new strategies need to be considered. This helps provide accountability and can be used to keep stakeholders informed and engaged. Evaluation of the LRSP strategies should be ongoing to ensure the effectiveness of the projects and the overall plan.

Addressing safety on local roads can be challenging. The development of an LRSP can serve as a cornerstone to building a comprehensive safety program to address the safety challenges on the roadways. Depending on needs and jurisdiction, the LRSP will vary in size and level of detail. The LRSP is a living document and should be revisited as established goals are achieved.

**Connecticut Safety Circuit Rider Program – A Valuable, No Cost Resource**

Connecticut’s Safety Circuit Rider program at the T2 Center, University of Connecticut, offers no cost technical assistance on roadway safety related issues and would be happy to assist your agency in the development of a LRSP.


FHWA has created a CD that provides quick and easy access to the latest information on local roads safety, it can be ordered from FHWA online at [http://safety.fhwa.dot.gov/local_rural/training/resourced/](http://safety.fhwa.dot.gov/local_rural/training/resourced/).

The Connecticut Technology Transfer Program is currently developing a Local Roads Safety Plan Workshop. Updated information will be posted on our website at [www.t2center.uconn.edu](http://www.t2center.uconn.edu) as this training and others in our new Safety Academy become available.
Local Road Safety Plans: Your Map to Safer Roadways

No matter what your resources, a Local Road Safety Plan will guide you to data-driven solutions and safer roads.


How Healthy is Your Road System?

Find out with systemic analysis

Systemic analysis is like a health screening for your road system. Just as your doctor identifies risk factors for illness, systemic analysis identifies locations that are at highest risk for severe crashes. Practitioners can then reduce severe crashes across the whole at-risk system.

Symptoms
Severe roadway departure crashes on curves.

Possible Risk Factors:
- Avg Daily Traffic > 1,000 vehicles
- Curve Radius < 1,000 feet
- Intersection within Curve
- Vehicle Speed within Curve
- Severe Crash within Curve

Diagnosis
11% of all curves have 3 or more risk factors.

Lab Results:
- Curve A
- Curve B
- Curve C
- Curve D
- Curve E

Treatment
Monitor highest risk sites and implement low-cost countermeasures such as chevron signs or rumble strips.

Follow-Up
Track and evaluate safety improvements. Further remediation can be implemented as needed.

Systemic vs. Systemwide

Systemic does not mean treating all locations. It allows ghters to treat the highest-risk sites within limited budgets.

For more information visit
For more information on ways our Safety Circuit Rider can help you with your local road safety needs, please contact:

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For other Tech and Safety Briefs or more information about the Technology Transfer Center please visit us at: www.T2Center.uconn.edu