

## Safety Improvements

Divided into three categories (UGPTI):

1. Immediate safety improvements that should be made – vegetation removal, delineation in clear zone, signing
2. Low-cost improvements that could have a positive impact on safety signing, pavement markings, delineation
3. High-cost improvements that should be considered when funds are available for a major rehabilitation – construction, re-construction

### FHWA Safety Audit

<http://safety.fhwa.dot.gov/rsa/>



## Crash Data

- 85% of fatal crashes in ND occurred on rural roads
- Crash factors:
  - Speed was a factor in 41% of ND crashes
  - Failure to yield was the number one contributing factor for drivers aged 65 and older involved in crashes
  - Seat belt use in injury crashes was 65% on rural roads and 80% on urban roads
- The estimated economic loss due to ND motor vehicle in 2007 crashes was \$471,900,600

*Source: ND DOT, 2007*



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# Traffic Safety Evaluation



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[www.ugpti.org/rtssc/](http://www.ugpti.org/rtssc/)

## What is a TSE?

"A formal safety examination of an existing or future road or intersection by an independent, multidisciplinary team." — *as defined by FHWA*

## Why a TSE?

A review of road characteristics is valuable in preventing future crash types, given the random nature of rural crash locations.

## Purpose

- Identify potential safety issues and opportunities for safety improvements taking into account all roadway users
- Improve safety along either an existing roadway or a new roadway in the planning, design, or construction stages
- Increased application of safe design practices

## Process

- Select road or site
- Form interdisciplinary team
- Gather pre-site resources
- Conduct site review and discussion
- Conduct post-site evaluation
- Make Formal recommendation
- Follow-up



## Benefits

- Currently being used by counties across the United States as a cost-effective opportunity to make significant safety improvements at stages, ranging from project development and planning through existing operations and maintenance
- Effective on projects of all shapes and sizes
- Accounts for human factors

- Proactive approach to road safety
- Opportunity for low cost safety/high value improvement opportunities
- May reduce costs by identifying safety issues and correcting them before projects are built
- Promote awareness of safe design and maintenance practices
- Integrate multimodal safety concerns
- Consider human factors in all facets of design
- Sharing of knowledge between external and local entities
- Interdisciplinary team approach

*Source: NDSU, UGPTI*

- Improve traffic safety and operations conditions
- Creates public confidence in road safety
- Implement best engineering and enforcement practices to improve overall traffic safety
- Improve the efficiency of traffic safety managers

*Source: UC-Berkeley; KDOT*

