Innovative Rural Safety Research: What is Needed to Get Rural to Zero?

December 6, 2018

Presented by:
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Goals for Today

• Describe the NCHRP 20-122 Project background and process
• Identify additional safety research needs to be included in the roadmap
Session Outline

1:15-2:15 PM
- Introductions (10 min)
- Project Background (20 min)
- Safety Breakout (30 min)

2:30-3:30 PM
- 15 Topic Breakout (40 min)
- Recap (20 min)
Presentation Agenda

• Project Panel
• Project Overview
• Critical Needs Categories
• Project Process & Progress to Date
• Key Safety Issues
• Draft Safety Research Needs
• Next Steps
• Break-out Group Distribution
Project Panel

Charles Carr, MS DOT, Chair
Barbara Cline, Transit
Santo Grande, Transit
Ronald Hall, University/Tribal
Kristin Joyner, Transit
Peggi Knight, Iowa DOT
Dianne Kresich, AZ DOT
Dale Peabody, ME DOT
Robin Phillips, Transit
Fred Schmidt, University
Julie White, NC DOT
Pat Wise, MTDOT
Guohui Zhang, University
Jill Stark, FHWA Liaison
Elan Flippin, FTA Liaison
Caroline Kieltyka, AASHTO Liaison
Tim Klein, OST/R Liaison
Jennifer Weeks, TRB Liaison
Stephan Parker, NCHRP SPO
NC HRP 20-122 Overview

- **Identify critical rural transportation issues** that can be addressed by research through NC HRP and other research programs
- **Produce a research roadmap** that can assist state DOTs and other public agencies and help inform policy-driven investment decisions
- **Develop early-action items** and longer-term research needs
NC HRP 20-122 Overview

• Created a framework for the roadmap
  • Define different rural community types
  • Categorize rural critical needs
  • Create fact sheets as conversation starters
What is a Research Roadmap?

- Curated collection of Research Needs
- Helps establish near-term and long-term research agenda
- Helps define priorities and sequencing of research work
- Assists state DOTs, AASHTO, and TRB staff when considering proposed national studies
- Facilitates formation of state Pooled Funds Studies
- Lists potential research topics for MS and PhD students
Categories for Critical Needs

1. Active transportation
2. Workforce development
3. Transportation access and mobility
4. Intersection of health and transportation
5. Generational expectations, work & lifestyle
6. Transporting rural products to market
7. Weather, climate and resilience
8. Rural public and school transportation
9. Law enforcement, crime and drugs
10. Aviation
11. Connected and automated vehicles and emerging technologies
12. Tourism and the natural environment
13. Roadway infrastructure and balancing capacity with demand
14. **Rural transportation safety**
15. Funding, policy and economy
Project Process

- Literature Review
- Gap Analysis
- TRB Committees
- Previously Submitted CRP Research Needs Statements
- Environmental Scan and Fact Sheets
- Georgia Workshop Dec 2018
- TRB Workshop Jan 2019
- Colorado Workshop Sept 2018

Research Needs

Rural Transportation Research Roadmap

- Completed
- In Progress
- Future Task
Progress to Date

Stakeholder Workshop #1
28-Sep-2018
- 7 Research Ideas
- 14 Topical Fact Sheets

Interim Report
23-Oct-2018
- 25 Candidate RNS
- Environment Scan
- Literature Review

AASHTO R&I Meeting
29-Oct-2018
- 7 Proposed Problem Statements
Key Safety Issues

- Geometric design
- Crash types and countermeasures
- Safety culture
- Speed management
- Behavioral Interventions
- Teen and older drivers
- Tribal transportation safety
- Motorcycles and ATVs
- Child Passenger Safety
Key Safety Issues

• Human Factors
• Enforcement Laws and Policies
• Cross Jurisdictional Planning
• Retro-reflectivity and Nighttime Visibility
• Safety Performance Measures and Monitoring
• Systemic Safety
• Safety Data/Crash Records
• Incident Management
• Animal Vehicle Countermeasures
Draft Safety Research Needs

Please refer to the 11x17 handout
Questions & Contacts

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Break-out Groups (2)

- County Engineers
- State DOT
- FHWA
- Law Enforcement
- Planning Organizations
- Vendors
- University
- Other
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