



Montana Department of Transportation
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Memorandum

To: RRC Members
Steve Albert/WTI
Debbie Alke, Administrator/ Aeronautics Division
Mike Bousliman, Administrator/Information Services Division
Jeffery M. Ebert, P.E./District Administrator-Butte
Larry Flynn, Administrator/ Administration Division
Dwane Kailey, Administrator/Highways and Engineering Division
Bob Seliskar/FHWA
Jon Swartz, Administrator/Maintenance Division
Mike Tooley/Director
Duane Williams, Administrator/Motor Carrier Services Division
Pat Wise/Deputy Director
Lynn Zanto, Administrator/Rail, Transit, and Planning Division

From: Susan C. Sillick, Manager
Research Programs

Date: July 14, 2014

Subject: March 26, 2014 RRC Meeting Notes

RRC Members Present: Mike Bousliman, Sue Sillick, Jon Swartz, Duane Williams, and Pat Wise.

Others Present: Danielle Bolan, Kris Christensen, Brandi Hamilton, and Matt Strizich.

1. **Budget Report:** Attached

No discussion.

2. **Research Projects - current listing:** Attached

No discussion.

3. **Reports:** Available on Research [website](#)

No discussion.

- a. **Evaluating WVC and Habitat Connectivity in the Madison Valley (11-007)-** Progress Reports
- b. **Impacts of Increased Canadian Economic Development (ICED) Phase 2 (12-002) -** Task 2 and 3 Reports.

- c. **Montana LTAP- Progress Reports**
- d. **Montana Weigh-in-Motion (WIM) and Automatic Traffic Recorder (ATR) Strategy (11-005) Task Report 2.**
- e. **Research the Feasibility of Utilizing Recycled Asphalt Pavement (RAP) in Portland Cement Concrete Pavement- Phase 2 (9.004)- Task 2 Report**

4. **Proposals:** Attached

a. **Safety Impact of Differential Speed Limits on Rural 2-Lane Highways in Montana Rural**

Danielle Bolan, representing the project technical panel, presented this proposal. Eight states maintain differential speed limits; however, none other than Montana have differential speed limits on two-lane rural roads. The objectives of this research are to:

- ★ Determine the safety impacts associated with the use of differential speed limits on rural two-lane roads, including the impacts on crash frequency and severity.
- ★ Determine the operational impacts associated with the use of differential speed limits on rural two-lane roads, including the impacts on speeds, queues, and passing maneuvers.
- ★ Determine and define guidance towards the use or non-use of regulatory speed limit differentials on two-lane rural highways.

The following tasks are proposed to accomplish these objectives.

- ★ Review of literature and nationwide policies and practices
- ★ Collect and analyze traffic operational data
- ★ Collect and analyze traffic crash data
- ★ Perform trucking industry survey
- ★ Perform road user survey
- ★ Develop guidelines for differential speed limit policy in Montana

The benefits of this research include the following:

- ★ Documentation of the operational and safety effects of the statutory speed differential on two-lane rural highways in Montana.
- ★ Guidance towards the use of speed differentials on two-lane rural highways, including specific conditions under which uniform speed limits may serve as a better option than differential speed limits.
- ★ Direction towards future policy making related to differential speed limits.
- ★ Guidance towards performing future speed limit audits and safety reviews on highway corridors.

Danielle responded that the speed limit is statutory and the research will provide information that can be taken to the legislature as necessary.

This research is scheduled to be completed within 18 months for \$217,619.14.

It was noted that the research organization (Wayne State University) was chosen through a modified RFP process where all public universities were invited to submit a letter of

interest. Through the process, two universities were invited to propose on this topic, with this proposal being top ranked by the project technical panel.

Mike asked about the impact of passing lanes. Danielle responded that passing lanes can help to mitigate the issue.

Duane asked how a truck would be defined, as there is some grey area as to what constitutes a truck. Brandi responded that for maintenance purposes, a truck is defined as high profile. This is an issue that will need to be worked out and would likely be added to the state survey.

Jon questioned the 52% IDC rate. Sue indicated that it was reasonable for a university, with MSU's and UM's being in the 40% - 50% range. It was also stated that private consultants charge a much higher IDC, usually about 150%.

Jon made a motion to approve the proposal. Mike seconded the motion, which was approved by acclamation.

b. Western Alliance for Quality Transportation Construction (WAQTC) Pooled Fund Program

Matt Strizich was in attendance to champion MDT participation in this pooled-fund study. WAQTC was formed in 2002 in order to meet federal requirements in 23 CFR 637, Subpart B - Quality Assurance Procedures for Construction which requires MDT to have qualified technicians performing all materials acceptance testing on federal aid construction projects. Ten western states and Western Federal Lands formed this alliance in order to develop a training program that would allow reciprocity among member states and minimize duplication of efforts in developing the training materials and programs required by federal mandate.

The benefits of participation in this pooled-fund study include the following:

- ★ Comprehensive training materials developed and updated with MDT input
- ★ Standardized testing materials
- ★ Development of new training programs as they are identified
- ★ Procedural reviews and development conducted with other state representatives
- ★ Test procedure and protocol transfer among states

As a result of this pooled-fund study, the member states have been successful in getting the AASHTO Subcommittee on Materials to change AASHTO test procedures, which this Subcommittee develops.

Jon asked if any states have dropped out of the pooled-fund study. Matt responded that TX and HI have done so, but that TX has its own program. HI may rejoin again. WY and ND were never participants in this pooled-fund study.

Member states contributed \$50,000 from 2003-2007; this funded operations to date. To fund operations through 2016, Matt is requesting \$60,000, with \$30,000 contributed in FFY 2014 (\$15,000 each for FFYs 2013 and 2014), and \$15,000 in each successive year.

Jon made a motion to approve \$60,000 in funding for this pooled-fund study. Duane seconded the motion which was approved by acclamation.

c. **North/West Passage Pooled Fund Study**

Brandi Hamilton was present to champion this pooled-fund study. The North/West Passage (NWP) Corridor, which includes I-94 and I-90 from Wisconsin to Washington, is entering its ninth year as a pooled-fund study. The goals of the program are to implement and evaluate integrated traveler information systems and coordinate maintenance operations across state borders. The long-term vision of the NWP Corridor states is to effectively use methods of sharing, coordinating, and integrating traveler information across state borders and to influence ongoing standards development.

Benefits to MDT as a result of NWP include the following:

- ★ Development of the NWP Traveler Information website
- ★ Corridor-wide consistent event descriptions to facilitate consistent messages and phrases when sharing messages corridor-wide
- ★ 511 system enhancements
- ★ Possibilities of information sharing among multiple agencies statewide
- ★ Clarus, an integrated surface transportation weather observing, forecasting, and data management system
- ★ Standard operating procedures for dynamic message signs and road closures

Brandi mentioned that, recently, MDT was successful in being awarded two MCOM grants, which will be used for an operational traveler system beyond what NWP provides and pulls all of the efforts together, including data consistency.

Brandi requested \$50,000, with \$25,000 each for FFYS 2015 and 2016 to be applied to the Phase 8 work plan which includes several projects that focus on the continued development and expansion of integrated traveler information systems, as well as the investigation of options to promote consistent application of the recently adopted federal rule regarding real-time system management information program (23 CFR 511). Also, there is interest in a citizen's weather reporting system and a traffic management center.

Mike asked if the NWP states are aware of the work Traffic Engineering is doing for the statewide signal upgrade and plan. Brandi reported she is working with Engineering staff and has had some conversation with Danielle Bolan with regards to this effort.

There was some discussion as to whether the RRC should approve funding for more than two years for this pooled-fund study with annual reports placed on future RRC agendas.

Duane made a motion to approve this pooled-fund study for four years of funding (\$25,000 each year for a total of \$100,000). Mike seconded the motion, which was approved by acclamation.

5. **Implementation/Performance Measures/Technology Transfer**

a. **Re-evaluation of Montana's Air Quality Program**

This item will be rescheduled for the May RRC meeting, as Lynn was unavailable.

6. **Department/Division Hot Topics – RRC Members Roundtable Discussion**

Sue announced the annual solicitation for research ideas is ongoing, with topic statements due April 30, 2014. Sue also mentioned UTDOT is on a similar timeline with development of new research projects and she will work with UTDOT to determine if there are any projects of mutual interest.

Mike said he would like to better define IT architecture and a plan to implement, he indicated OHDOT used research funds for their effort on the same topic. He'd like to submit this topic for the solicitation and indicated it would likely be a collaboration between MDT and an IT consultant. He said he would send Sue a link to determine if this topic qualifies for SPR funds.

Copies: Craig Abernathy/Research Section
Audrey Allums/Grants Bureau
Kent M. Barnes, P.E./Bridge Bureau
Katy Callon/Research Section
Kevin Christensen/Highways and Engineering Division
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Jim Skinner/Planning and Policy Analysis Bureau
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