

## TRANSPORTATION POOLED FUND PROGRAM QUARTERLY PROGRESS REPORT

Lead Agency (FHWA or State DOT):       Texas Department of Transportation      

**INSTRUCTIONS:**

*Project Managers and/or research project investigators should complete a quarterly progress report for each calendar quarter during which the projects are active. Please provide a project schedule status of the research activities tied to each task that is defined in the proposal; a percentage completion of each task; a concise discussion (2 or 3 sentences) of the current status, including accomplishments and problems encountered, if any. List all tasks, even if no work was done during this period.*

<b>Transportation Pooled Fund Program Project #</b> TPF-5(482)	<b>Transportation Pooled Fund Program - Report Period:</b> <input checked="" type="checkbox"/> Quarter 1 (January 1 – March 31) <input type="checkbox"/> Quarter 2 (April 1 – June 30) <input type="checkbox"/> Quarter 3 (July 1 – September 30) <input type="checkbox"/> Quarter 4 (October 1 – December 31)	
<b>Project Title:</b> Development and Evaluation of Roadside Safety System for Motorcyclists		
<b>Name of Project Manager(s):</b> Chris Glancy	<b>Phone Number:</b> 512-416-4747	<b>E-Mail</b> Chris.Glancy@txdot.gov
<b>Lead Agency Project ID:</b>	<b>Other Project ID (i.e., contract #):</b>	<b>Project Start Date:</b> 2021
<b>Original Project End Date:</b> 2024	<b>Current Project End Date:</b> 2024	<b>Number of Extensions:</b>

Project schedule status:

On schedule     
  On revised schedule     
  Ahead of schedule     
  Behind schedule

Overall Project Statistics:

Total Project Budget	Total Cost to Date for Project	Percentage of Work Completed to Date
\$780,000	\$508,619	56.6%

Quarterly Project Statistics:

Total Project Expenses and Percentage This Quarter	Total Amount of Funds Expended This Quarter	Total Percentage of Time Used to Date
\$67,447.97; 9%	\$67,447.97	86.1%

**Project Description:**

The objective of this pooled fund study is to provide a cooperative approach to conducting research to address roadside safety issues specifically related to improving motorcyclist safety. Furthermore, the study is intended to provide participating states collaborative opportunities to stay abreast of best practices, new regulatory issues, risk management strategies, and other research pertaining to roadside safety improvements for motorcyclists. Research activities will include identification, development, and evaluation of strategies and devices for mitigating the frequency and severity of roadside departure motorcyclist crashes.

**Progress This Quarter (includes meetings, work plan status, contract status, significant progress, etc.):**

The following tasks were completed in this quarter:

**Task 1. Project Management**

- Midyear virtual meeting was scheduled for April 9<sup>th</sup>, 2024. Researchers will provide an update on project status.

**Task 2. Analyze Motorcycle Roadside Safety Issues**

- Project 5. Development and Full-Scale Crash Testing of an Improved Steel Railing for Use on Top of Barriers: Phase II
  - Detailed CAD drawings of the concrete barrier and chain link fence system were developed. The drawings were submitted to the lead tech rep for review and comments. The drawings were finalized.
  - Construction was initiated on the test installation. The reinforcement cages were set and concrete was poured for the barrier. The fence panels were built and shipped to the galvanizer. Chain link fence material was ordered.
- Project 6. Technology Transfer
  - Identified external resource information from organizations such as FHWA, NHTSA, etc.
  - Began developing and expanding content on individual website pages. This consisted of adding material to project pages, resource page, and state member page.
- Project 7. Development of Safety Standards for Testing of Motorcycle Helmets for Use in Roadside Safety System Crashworthiness Evaluation
  - Completed construction of impact sled assembly and attached pulley mechanisms to impact plate.
  - Preliminary tests were conducted preliminary tests to measure speeds and verify impact consistency. The impact speed variance was more than the tolerance window. Additional Teflon taping and new pulleys were ordered to remove snagging/catching spots.

**Anticipated Work Next Quarter:**

- Project 5. Development and Full-Scale Crash Testing of an Improved Steel Railing for Use on Top of Barriers: Phase II
  - Complete construction of the test installation
  - Conduct upright motorcycle impact crash test (tentatively scheduled for May 31<sup>st</sup>, 2024)
  - Conduct MASH Test 3-11 crash test (tentatively scheduled for June 4<sup>th</sup>, 2024)
- Project 6. Technology Transfer
  - Continuing developing and expanding content for individual website pages. Add content to about page and Q&A section.
  - Modify styles and organization on projects page.
- Project 7. Development of Safety Standards for Testing of Motorcycle Helmets for Use in Roadside Safety System Crashworthiness Evaluation
  - Perform additional test runs to verify impact speed consistency
  - Install and attach ATD head and neck assembly to table
  - Conduct tests on all motorcycle helmets

**Significant Results:**

**Potential Implementation:**