Montana Department of Transportation Research Programs April 2009

EXPERIMENTAL PROJECT WORK PLAN

EVALUATION OF STRIETER-LITE WILD ANIMAL HIGHWAY WARNING REFLECTOR SYSTEM™ ON REDUCING VEHICLE-ANIMAL COLLISIONS

Location:	Highway MT 69, P-69, Jefferson County, Butte District: Approximate Reference Point 1.72 to 2.8	
Project Name:	Safety Improvement Project Fencing – East of Whitehall	
Project Number:	HSIP 69-1(22)2	
FHWA Project Number:	MT 09-02	
Project Type:	An experimental trial of a wild animal reflector warning system for reducing the number of vehicle and animal collisions.	
2004 AADT:	1,370 (12.9% Trucks)	
Principal Investigators:	Kris Christensen, Research Project Manager Craig Abernathy, Experimental Program Manager	

Objective

Determine the effectiveness of wild animal reflector warning systems for reducing the number of vehicle and animal collisions and the maintenance efforts needed to maintain this type of system.

Goals:

- 1. Record installation of reflector warning system
- 2. Document maintenance of reflector warning system
- 3. Record the removal of animal carcasses in project area
- 4. Track animal and vehicle collision data in project area

Experimental Design

Installation of the Strieter-Lite Wild Animal Highway Warning Reflector system, consisting of 668 reflectors along MT Highway 69 between reference points 1.72 and 2.8 for a project length of 1.1 miles. Research will monitor the installation of the reflector system (if possible) or document it shortly after completion and report on any issues based on visual observation. If unable to be at site during installation, Research will interview Maintenance crew regarding installation process and document any comments and/or concerns.

Evaluation Procedures

Research will document the installation process of the reflector system either during installation or shortly after completion. An initial drive through of study area at night will be conducted to observe the effects of the reflector system on drivers and to note the reflection system from the shoulder or side of road.

Research will coordinate with the Whitehall Maintenance Section (Jay Quillici, Section Supervisor) for the collection of informational items. Items include but not limited to:

- Number of animal carcasses collected in study area (pre/post numbers)
- Reflector system maintenance (i.e. cleaning, replacements, and adjustments)
- Maintenance of study section (i.e. mowing, plowing, etc...)

Research will assemble crash data for study area and differentiate vehicle and animal collision information as well as the time of each incident. This data will be assembled for 5 years prior to installation of reflector system and for 5 years after.

Evaluation Schedule

Research will monitor performance for a period of five years annually, with every year up to *ten years (informally/optional). This is in accordance with the Department's "Experimental Project Procedures." Delivery of a construction/installation report, interim, annual or semi-annual reports is required as well as a final project report (responsibility of Research). All products will be distributed internally to appropriate staff and posted to the Departments intra/internet site.

2010:	Installation	Research Installation/Construction Report
2011-2014:	Annual Evaluation	Annual Reports
2015:	Final Evaluation	Final Report (annual if elected to continue the evaluation)
*2016-2021:	Annual Evaluation	Annual Reports (Informal)