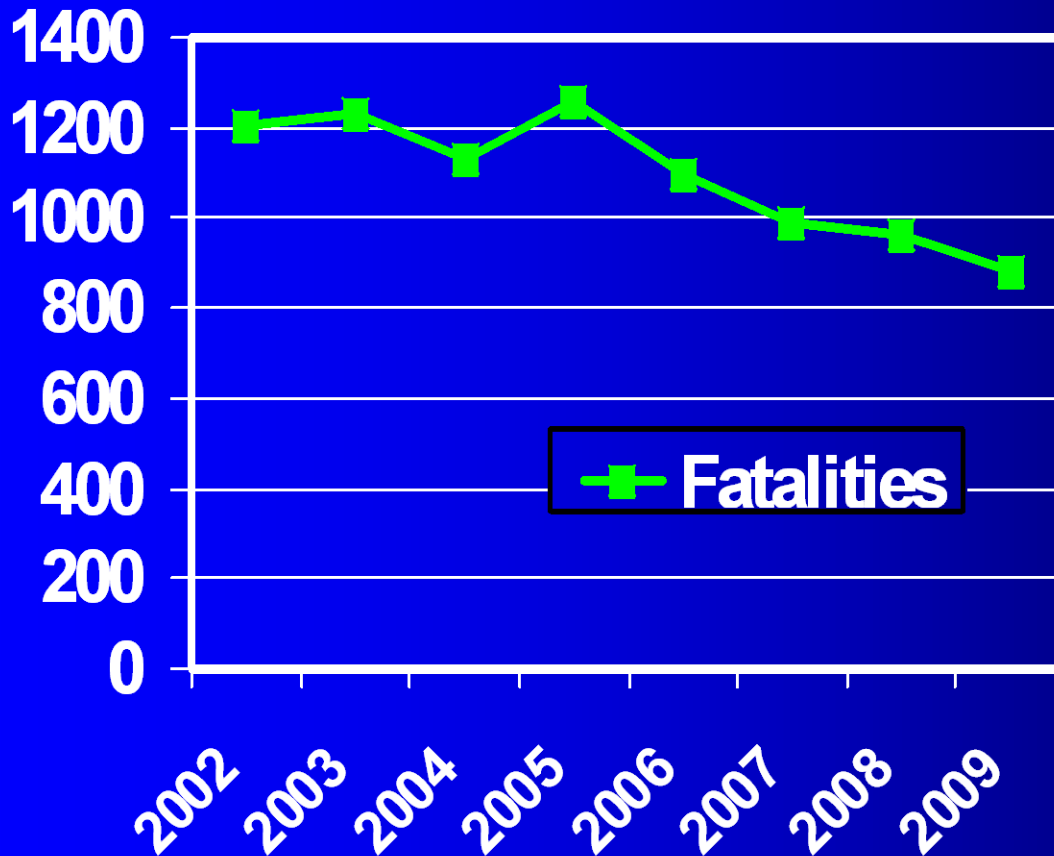


Making Highways Safer

Innovations and Solutions



8 Year Fatality Trend



2002 = 1,208

2003 = 1,232

2004 = 1,130

2005 = 1,257

2006 = 1,096

2007 = 992

2008 = 960

2009 = 880

Fatal Crash Locations are Random

Fatal Crash Types are Not

**People continue to die on our roadways
making the same mistakes year after year**

2006

No Seat Belt

Run Off Road

Aggressive

Curves

Impaired

2007

No Seat Belt

Run Off Road

Aggressive

Curves

Impaired

2008

No Seat Belt

Run Off Road

Aggressive

Curves

Impaired

2009

No Seat Belt

Run Off Road

Aggressive

Curves

Impaired

Fatality Locations

| | 2005 Fatalities | | | | | |
|--------------|-----------------|-----|-------|-----|-------|-----|
| | Total | | Rural | | Urban | |
| State System | 967 | 77% | 686 | 71% | 281 | 29% |
| Non-State | 290 | 23% | 110 | 38% | 180 | 62% |
| Total | 1,257 | | 796 | 63% | 461 | 37% |

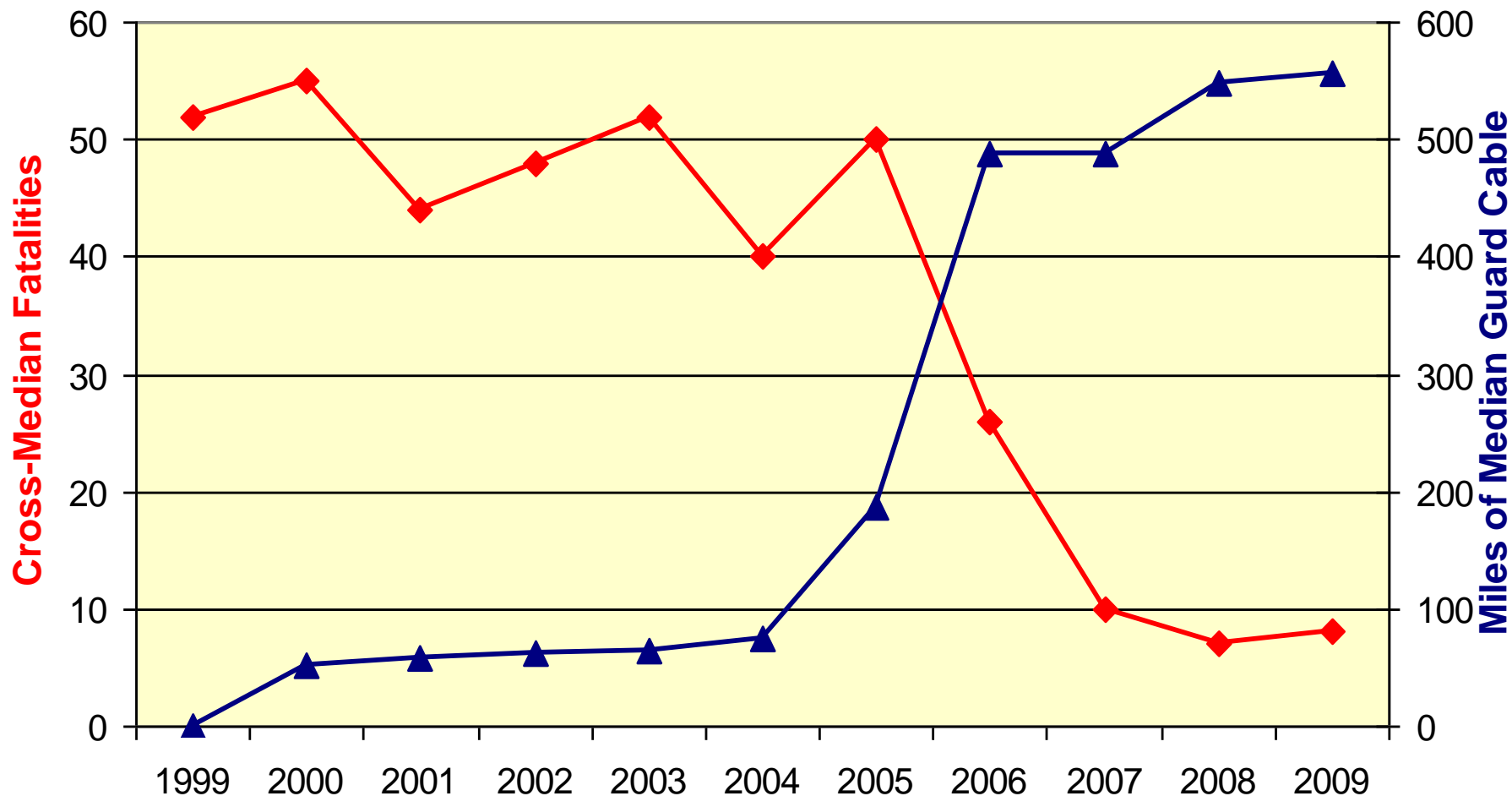
| | 2009 Fatalities | | | | | |
|--------------|-----------------|------|-------|-----|-------|-----|
| | Total | | Rural | | Urban | |
| State System | 654 | 74% | 473 | 72% | 181 | 28% |
| Non-State | 226 | 26% | 87 | 38% | 139 | 62% |
| Total | 880 | 100% | 560 | 64% | 320 | 36% |

Rural Solutions

- **System-wide Applications**
- **Roadway Design**
- **Intelligent Transportation System**
- **Rural Emergency Response**

Install Median Guard Cable

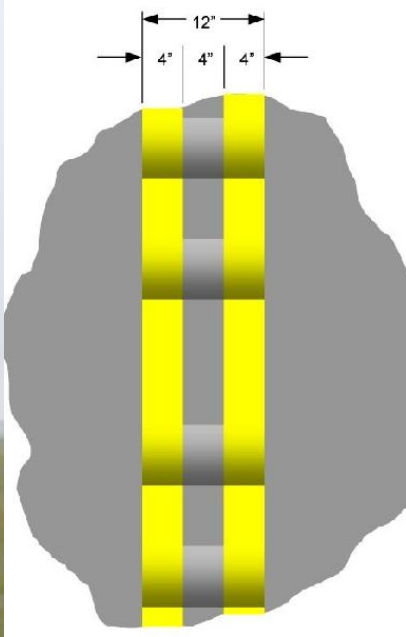
Interstate Cross-Median Fatalities and Median Guard Cable Installation



Implement System-wide Safety

- Improved Driving Surface
- 6-inch Stripes for Major Roads
- Improved Paved Shoulder

Implement System-wide Safety



- Install Rumblestrips
 - Edgeline & Centerline

Implement System-wide Safety

➤ Curve Speed Plaques

- Every Curve/Turn sign



➤ Improved Signs

- Larger & more visible

Implement System-wide Safety

➤ Better Delineation

➤ Emergency Reference Markers

MAR 8 2006



Implement System-wide Safety

- Install More Chevrons
- Paint More Edgelines

Implement System-wide Safety

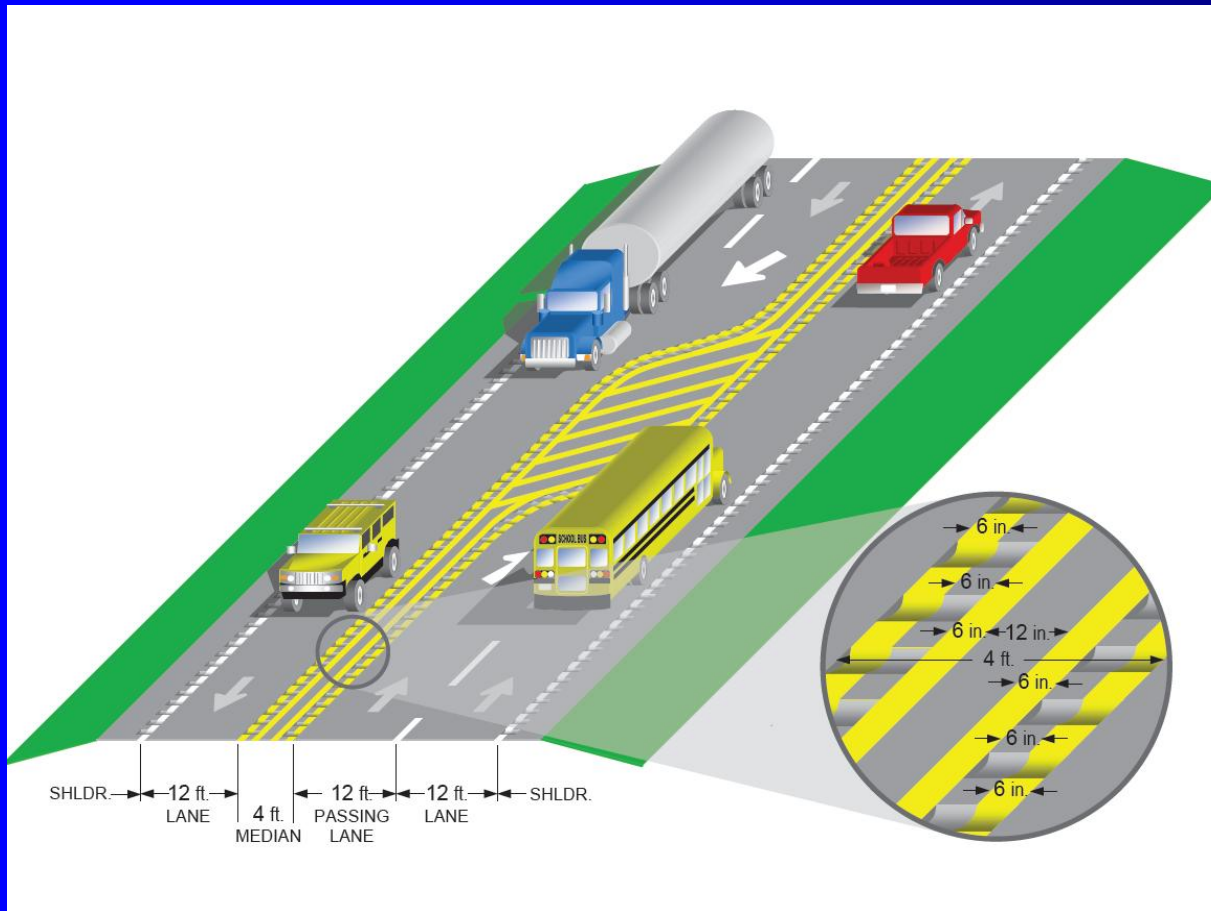
➤ Remove Objects

Results of Safety Solutions

- Reduced lane departure fatalities by 41% on state system major routes.
- Reduced nighttime fatal and disabling injury crashes on rural roads 25% to 77%.
- Received an estimated \$9.70 in benefits for every dollar spent
- 79 percent of Missouri motorists surveyed believe the improvements have been a good investment

Roadway Design

Shared Four-Lane Roadway



Benefits

Shared Four-Lane

Faster

Less time spent behind slow-moving vehicles.

Safer

Reduces crashes & their severity, as much as 55% compared to 2-lane roads.

Cheaper

Up to 75% less right-of-way, construction.

Flexible

Design can fit location.



Rural ITS

- 66 Electronic Message Boards
- 69 Closed Circuit TV Cameras
- 14 Road Weather Information Sensors



Rural Emergency Response

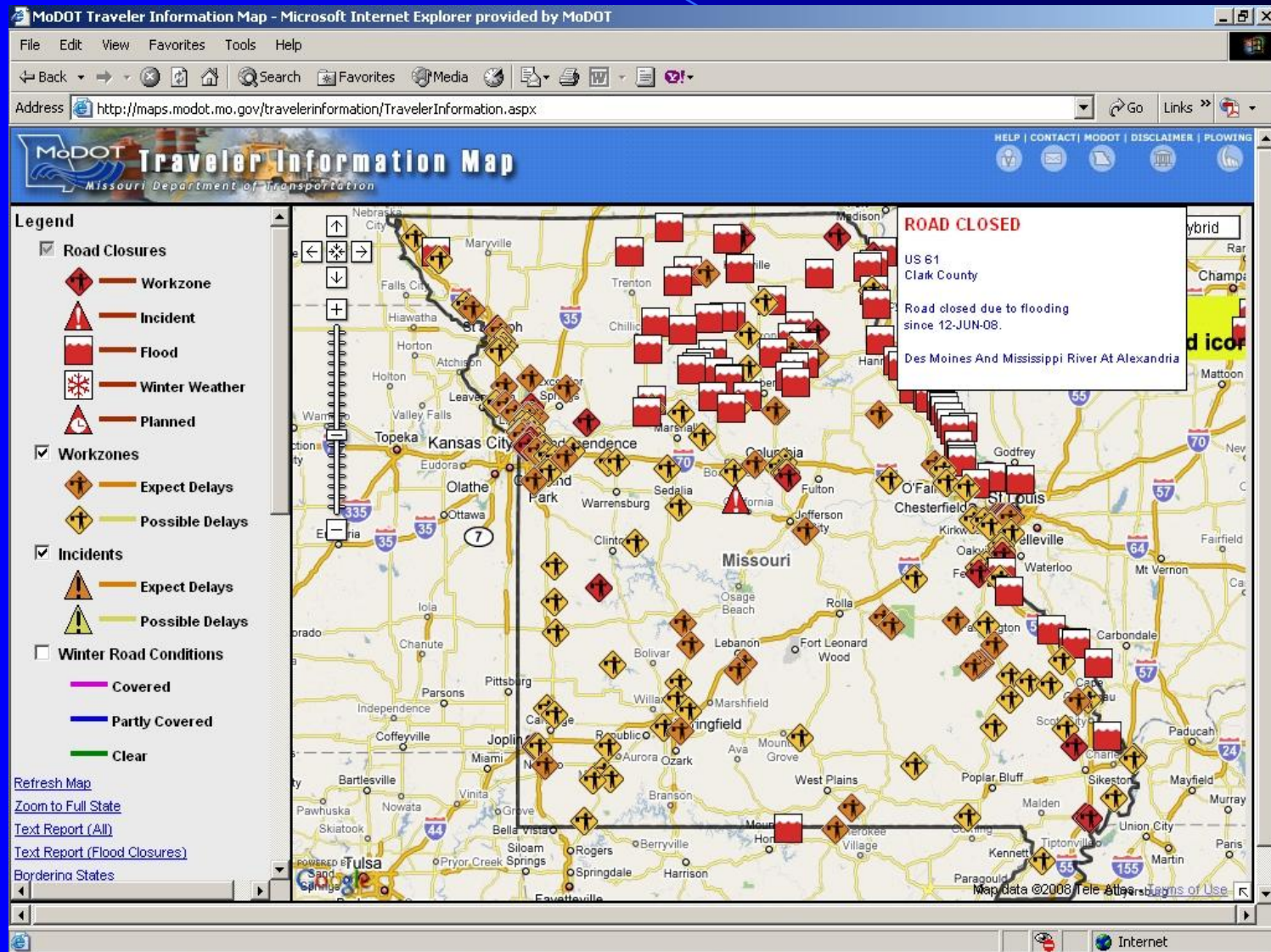
Primary Responsibility: Get the road open and traffic flowing again as soon as possible

- **Designated staff and equipment for traffic control on rural corridors**

- **24/7 Response Trucks equipped with traffic control and other basics**
- **Trailers positioned at key locations along rural corridors**



Traveler Information Map



2008-2012

MISSOURI'S
BLUEPRINT TO
ARRIVE ALIVE

GOAL

850 or Fewer

Fatalities

By

2012

