



Partners Meeting  
March 8, 2013



**WELCOME**

Darrin Grondel  
WTSC Director

# Commissioners



Governor Jay Inslee  
Commission Chair



Lynn Peterson  
Department of  
Transportation



Chief John Batiste  
Washington State  
Patrol



Alan Haight  
Department of  
Licensing



Mary Selecky  
Department of  
Health



Judge James P.  
Swanger  
Clark County District  
Court



Randy Dorn  
Superintendent of  
Public Instruction



Kevin Quigley  
Department of Social and  
Health Services



Sharon Dillon  
Washington State  
Association of Counties



Jon Snyder  
Association of  
Washington  
Cities

# The Target Zero Vision

Zero traffic deaths and serious injuries on Washington roads by the year 2030





# KEYNOTE

Chief John Batiste  
Washington State Patrol



# FOUNDATION FOR CHANGE

Darrin Grondel  
WTSC Director

# The Foundation for Change: A Structure and Process for Success



# The Foundation for Change: A Structure and Process for Success





# OVERVIEW

Debbie Rough-Mack  
Facilitator



# TARGET ZERO HISTORY

Steve Lind, WTSC Deputy Director  
Debi Besser, WTSC Program Manager

# Key Traffic Safety Events in the last 50 Years

- The Highway Safety Act of 1966 and William Haddon's Matrix
- MADD in the mid-1980s
- 2000: WA adopts Target Zero

# Haddon Matrix



HUMAN BEHAVIOR



VEHICLE SAFETY



ENVIRONMENT

**Pre-crash**  
(accident avoidance)

- Research
- Education
- Advocacy
- Enforcement

- Crash avoidance
- Security

- Road design for accident avoidance
- Traffic control

**Crash**  
(occupant protection)

- Proper use of belts & child safety seats
- Motorcycle and bicycle helmets

- Crashworthiness of motor vehicles

- Road design for injury mitigation

**Post-crash**  
(injury mitigation)

- Crash investigation

- Automatic Crash Notification

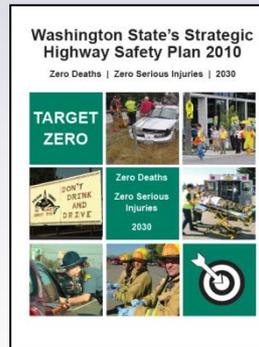
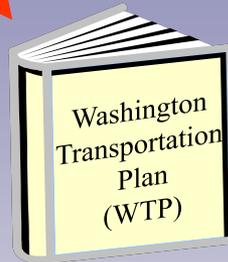
- Emergency medical services

# How did the Target Zero vision start in the US?

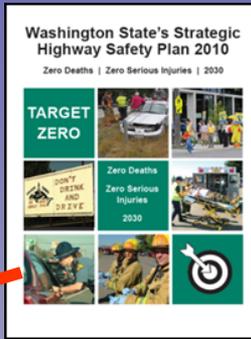
- Late 1990's: WTSC discussions - John Moffat
- 2000-2002: Key state agency and partners acceptance
- 2007: Follow NCHRP model and debate over priorities



# Governor's Priorities for Washington



**Target Zero:  
= Washington's  
Strategic Highway  
Safety Plan**



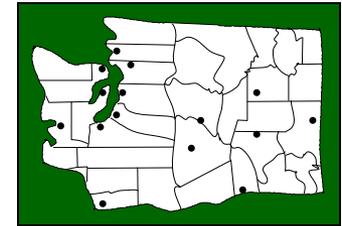
## State Agencies



*Implementation Recommended*

*Implementation Required*

## Local Agencies



## Private Industry & Non-profit Groups



## Indian Nations



# Key Elements of Target Zero Plan

- Many partners
- Data driven state priority areas
- Proven strategies

# Using Target Zero

- State agencies adopt common traffic safety goals and priorities
- Adapt TZ to reflect local priorities – Tribes, cities, counties, and RTPO's
- Employ the Haddon Matrix by identifying effective strategies for all 4E's



# Proven TZ Strategies Related to Run off the Road Crashes

- Reduce impaired driving and speeding
- Install rumble strips and guard rails

# Example of an Experimental Strategy That Has Not Yet Been Declared a Proven Strategy

# Run-off Road Strategies



# Major Target Zero Revisions



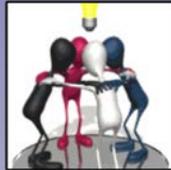
2013 (in process)	<ul style="list-style-type: none"><li>• Expanded Partners</li></ul>
2010	<ul style="list-style-type: none"><li>• Revised goal setting method</li><li>• Enhanced Tribal involvement</li></ul>
2007	<ul style="list-style-type: none"><li>• Set priorities, trend-lines, and goals</li></ul>
2000	<ul style="list-style-type: none"><li>• First adoption of "zero" goal</li></ul>

# Collaborative Update Process



## Data Analysts

- Dept. of Licensing
- Dept. of Health
- Dept. of Transportation
- State Patrol
- WA Traffic Safety Commission



## Project Team

- County Law Enforcement
- Dept. of Licensing
- Dept. of Health
- Dept. of Transportation
- Puget Sound Regional Council
- Tribal TZ Manager
- State Patrol
- WA Traffic Safety Commission



## Steering Committee

- AAA Washington
- Dept. of Behavioral Health Recovery (DSHS)
- Dept. of Health
- Dept. of Licensing
- Dept. of Transportation
- Governor's Office/OFM
- Harborview
- NW Assoc. Tribal Enforcement Officers
- State Patrol
- Superintendent of Public Instruction
- Tribal Transportation Planning Organization
- Target Zero Exec. Council
- WA State Association County Engineers
- WA Traffic Safety Commission

# Partners

- Tribes
- Advocacy Groups
- Driving Associations
- City Police Departments
- City Transit
- Courts
- Driving Organizations
- Federal Agencies
- Injury Prevention Organizations
- Legislative
- Regional Planning Councils
- State Agencies
- Target Zero Task Forces
- Technology Companies

# Target Zero Milestones

<b>Milestone:</b>	<b>Completed by:</b>
First draft	June 2013
Tribal and Stakeholder review	August 2013
Commission recommends approval to Governor	October 2013



# TARGET ZERO PRIORITIES

Steve Lind  
WTSC Deputy Director

# Updated Priorities

Changes from 2010 Target Zero:

- Three priority levels
- Considers both fatality and serious injuries

Considerations:

- Importance of addressing fatalities
- Work needed to strengthen serious injury data



# Previous Priority Ones

## 2000 - no priorities

<b>2007</b>	<b>Number of Fatalities (2001-5)</b>	<b>Percent Fatalities</b>
Impairment	1,466	47%
Speed	1,200	38%

<b>2010</b>	<b>Number of Fatalities (2006-8)</b>	<b>Percent Fatalities</b>
Impaired Driver	794	43.7%
Run-off-the-Road	771	39.2%
Speeding	707	38.9%

# Priority One

Washington State 2009-2011	Fatalities		Serious Injuries	
	Number	% of Total	Number	% of Total
<b>Priority One</b>				
<i>Alcohol and/or Drug Impaired Driver</i>	704	50.1%	1,515	20.9%
<i>Run Off the Road</i>	621	44.2%	2,154	29.7%
<i>Speeding-Involved</i>	555	39.5%	2,126	29.3%
<i>Young Driver Age 16-25-Involved</i>	487	34.6%	2,758	38.1%
<i>Distracted Driver-Involved</i>	425	30.2%	867	12.0%
<i>Intersection Related</i>	289	20.6%	2,474	34.1%
<i>Traffic Data Systems</i>	**	**	**	**



# Priority Two

Washington State 2009-2011	Fatalities		Serious Injuries	
	Number	% of Total	Number	% of Total
<b>Priority Two</b>				
<i>Unrestrained Passenger Vehicle Occupant</i>	344	24.5%	762	10.5%
<i>Unlicensed Driver-Involved</i>	253	18.0%	n/a	n/a
<i>Opposite Direction Multi-vehicle</i>	220	15.6%	702	9.7%
<i>Motorcyclist</i>	206	14.7%	1,225	16.9%
<i>Pedestrian</i>	193	13.7%	869	12.0%
<i>Emergency Medical Services and Trauma System</i>	**	**	**	**

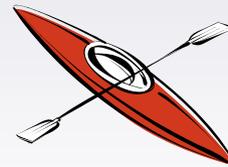
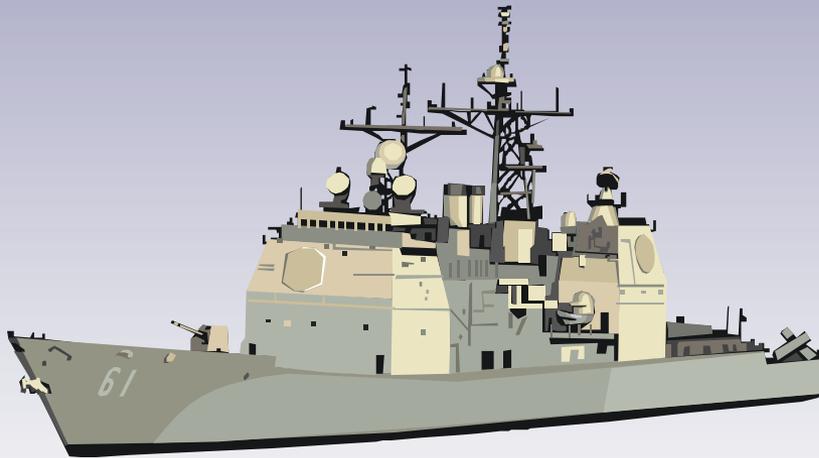


# Priority Three

Washington State 2009-2011	Fatalities		Serious Injuries	
	Number	% of Total	Number	% of Total
<b>Priority Three</b>				
<i>Older Driver-Involved (age 75+)</i>	98	7.0%	374	5.2%
<i>Heavy Truck-Involved (GVWR &gt; 10,000 lbs.)</i>	94	6.9%	238	3.3%
<i>Drowsy Driver-Involved</i>	45	3.2%	253	3.5%
<i>Bicyclist</i>	26	1.8%	339	4.7%
<i>Wildlife</i>	8	0.6%	78	1.1%
<i>Vehicle-Train</i>	8	0.6%	3	0.0%
<i>Work Zone</i>	6	0.4%	132	1.8%
<i>School Bus-Involved</i>	3	0.2%	18	0.2%



# A High Tide Floats All Boats





**BREAK**



# **TZ2013 DATA AND TRENDS**

Staci Hoff, PhD  
Research and Data Manager, WTSC

# How are we doing Nationally?

## 2000

	State	VMT Rate
1	Massachusetts	0.82
2	Rhode Island	0.96
3	New Hampshire	1.05
4	New Jersey	1.08
5	Connecticut	1.11
6	Vermont	1.12
7	New York	1.13
8	Maryland	1.17
<b>9</b>	<b>Washington</b>	<b>1.18</b>
	USA	1.53
*27 States Lower than USA Rate*		

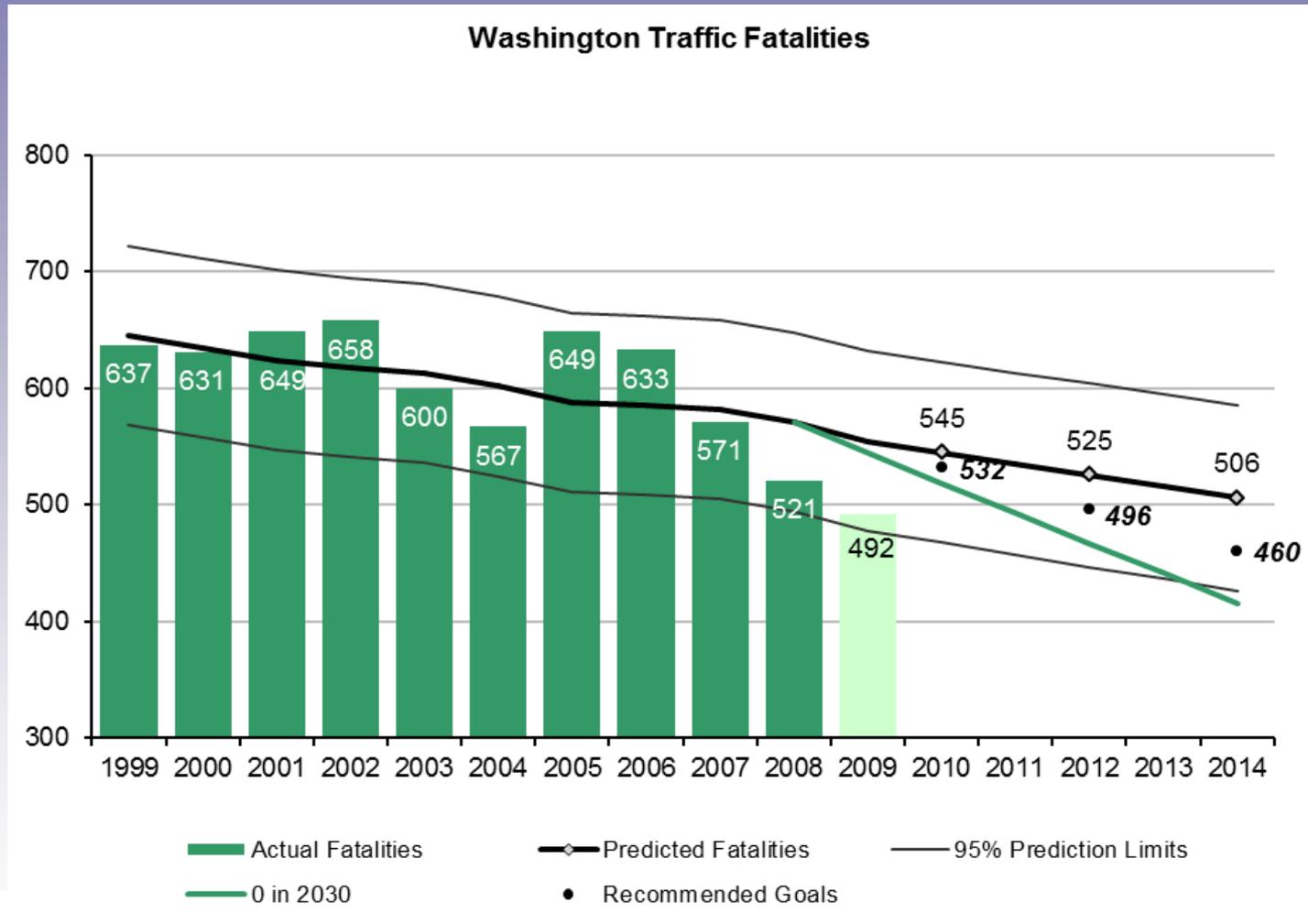
## 2005

	State	VMT Rate
1	Massachusetts	0.8
2	Connecticut	0.88
3	Vermont	0.95
4	Minnesota	0.98
5	New Jersey	1.01
6	New York	1.03
7	Rhode Island	1.05
8	Maryland	1.09
8	Michigan	1.09
9	Utah	1.12
10	Maine	1.13
<b>11</b>	<b>Washington</b>	<b>1.17</b>
	USA	1.46
*28 States Lower than USA Rate*		

## 2010

	State	VMT Rate
1	Massachusetts	0.58
*	District of Columbia	0.67
2	Minnesota	0.73
3	New Jersey	0.76
<b>4</b>	<b>Washington</b>	<b>0.8</b>
4	Rhode Island	0.8
	USA	1.11
*24 States Lower than USA Rate*		

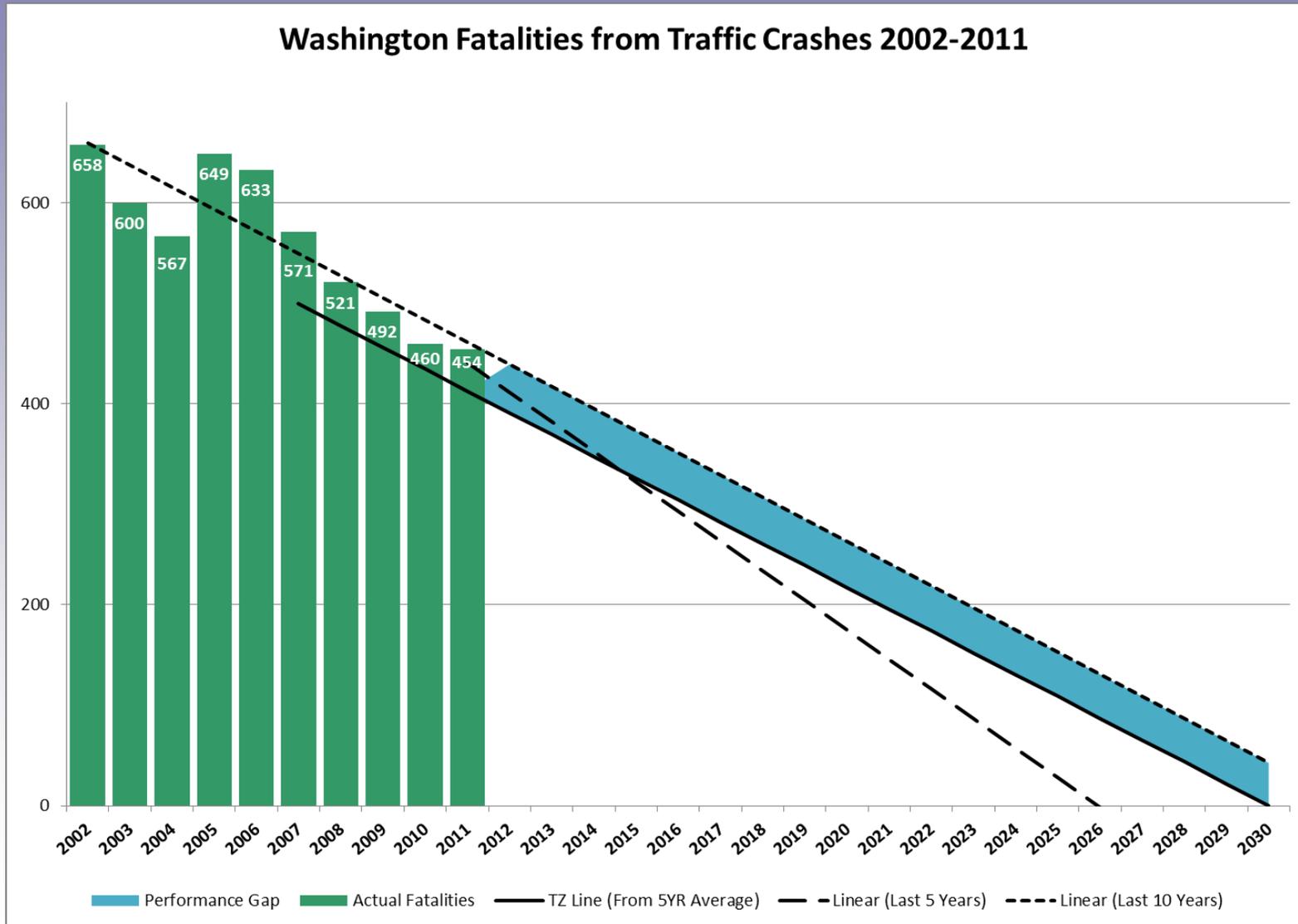
# Trend Method for TZ2010



# New Trend Method TZ2013

- Target Zero line = equal (linear) annual decrease to zero in 2030
- 10 year linear trend
- 5 year linear trend
- Performance gap (difference between the 10 year trend line and the target zero line)
- Standardized y-axis scales
- Expand the charts out to 2030

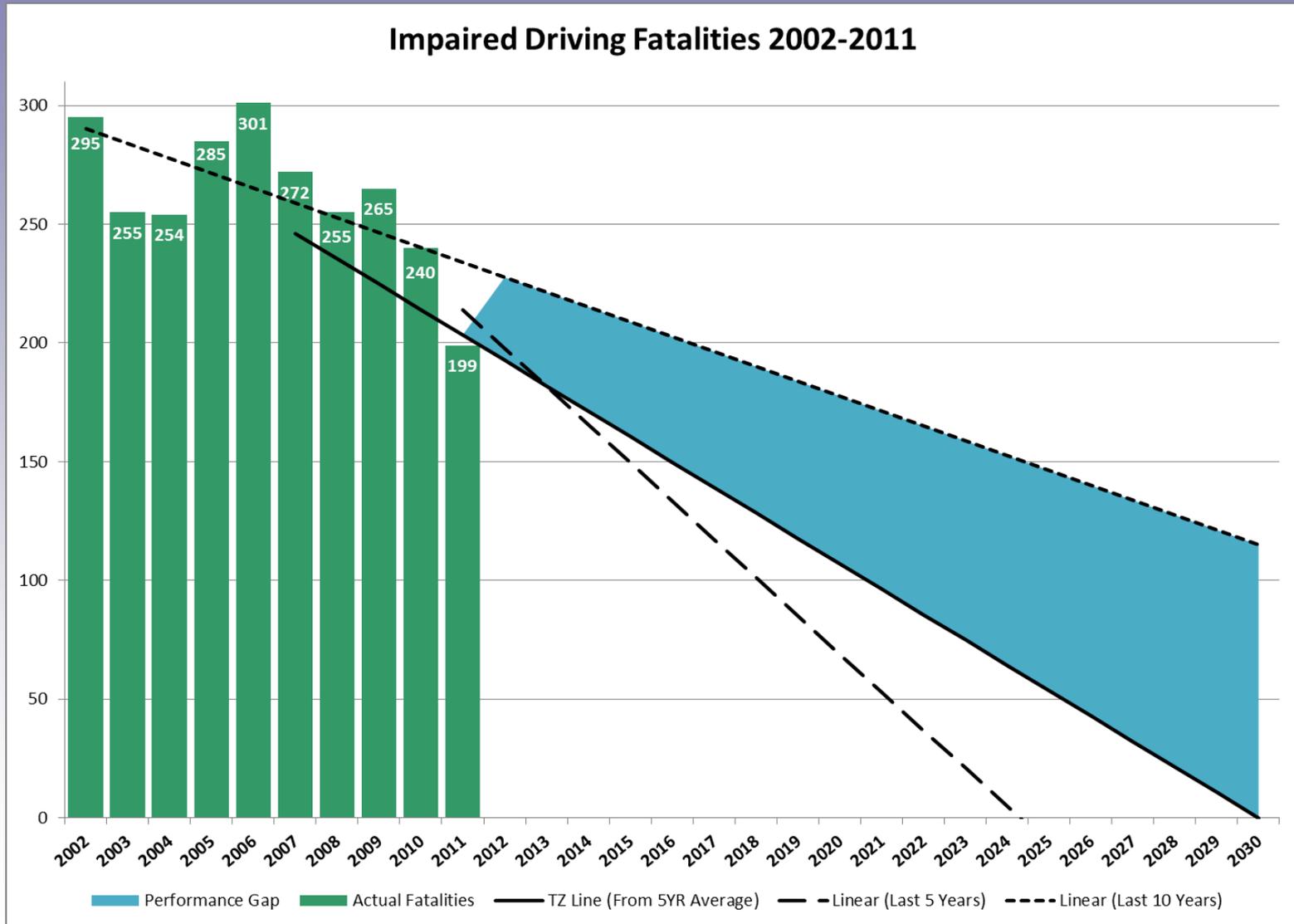
# A More Linear Approach...



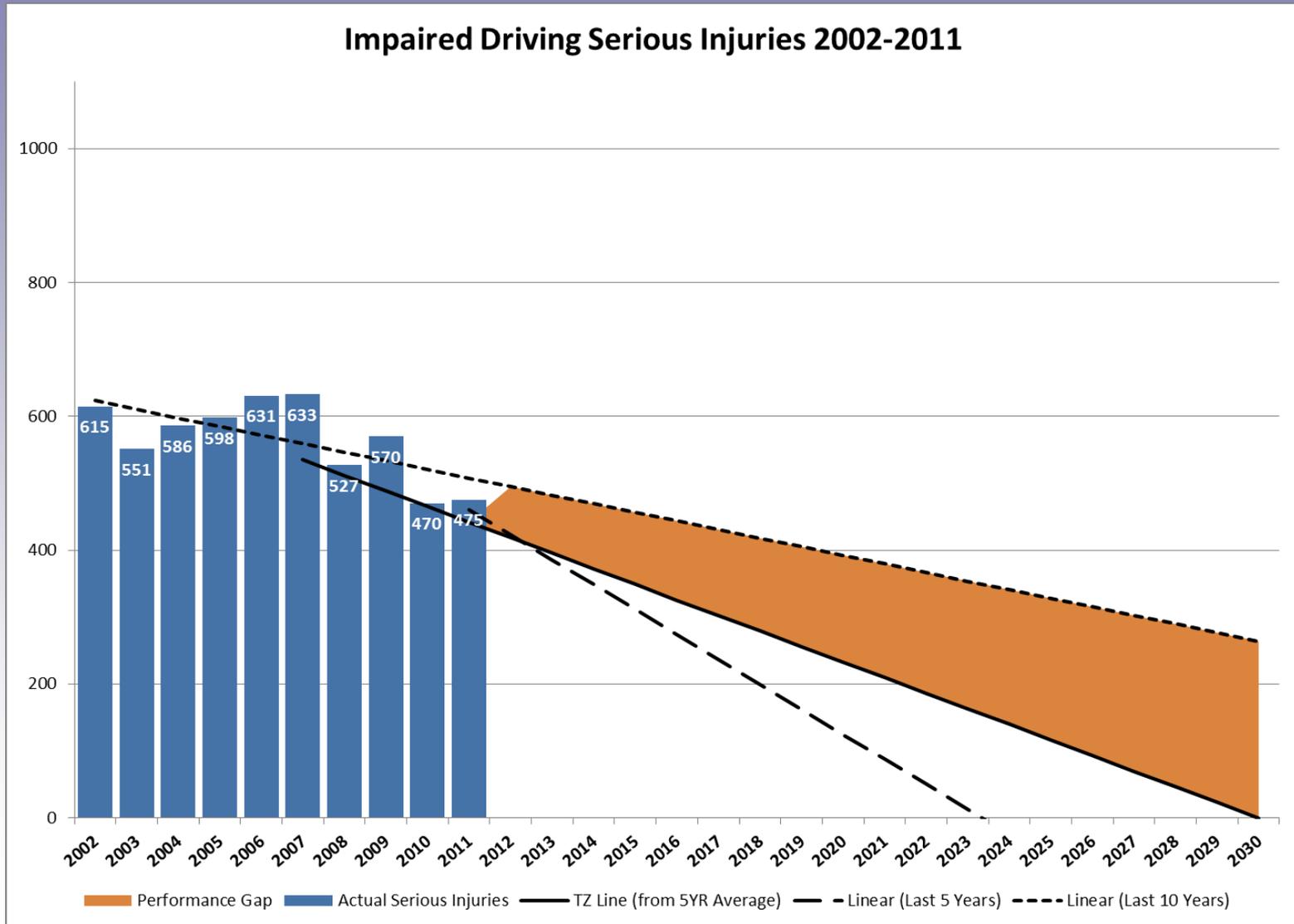
Show me the data!

Priority Level 1

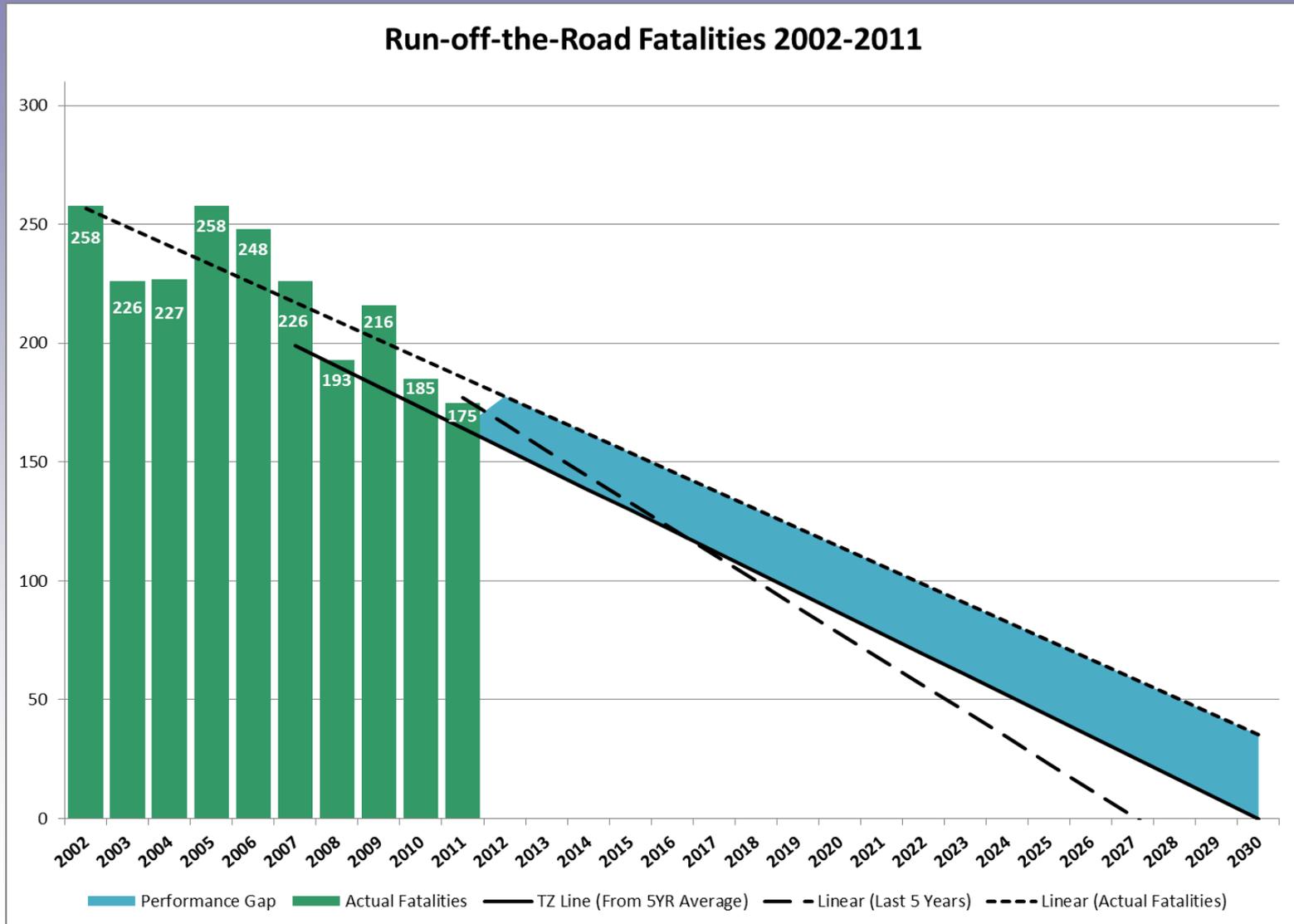
# P1: Impaired Driving



# P1: Impaired Driving

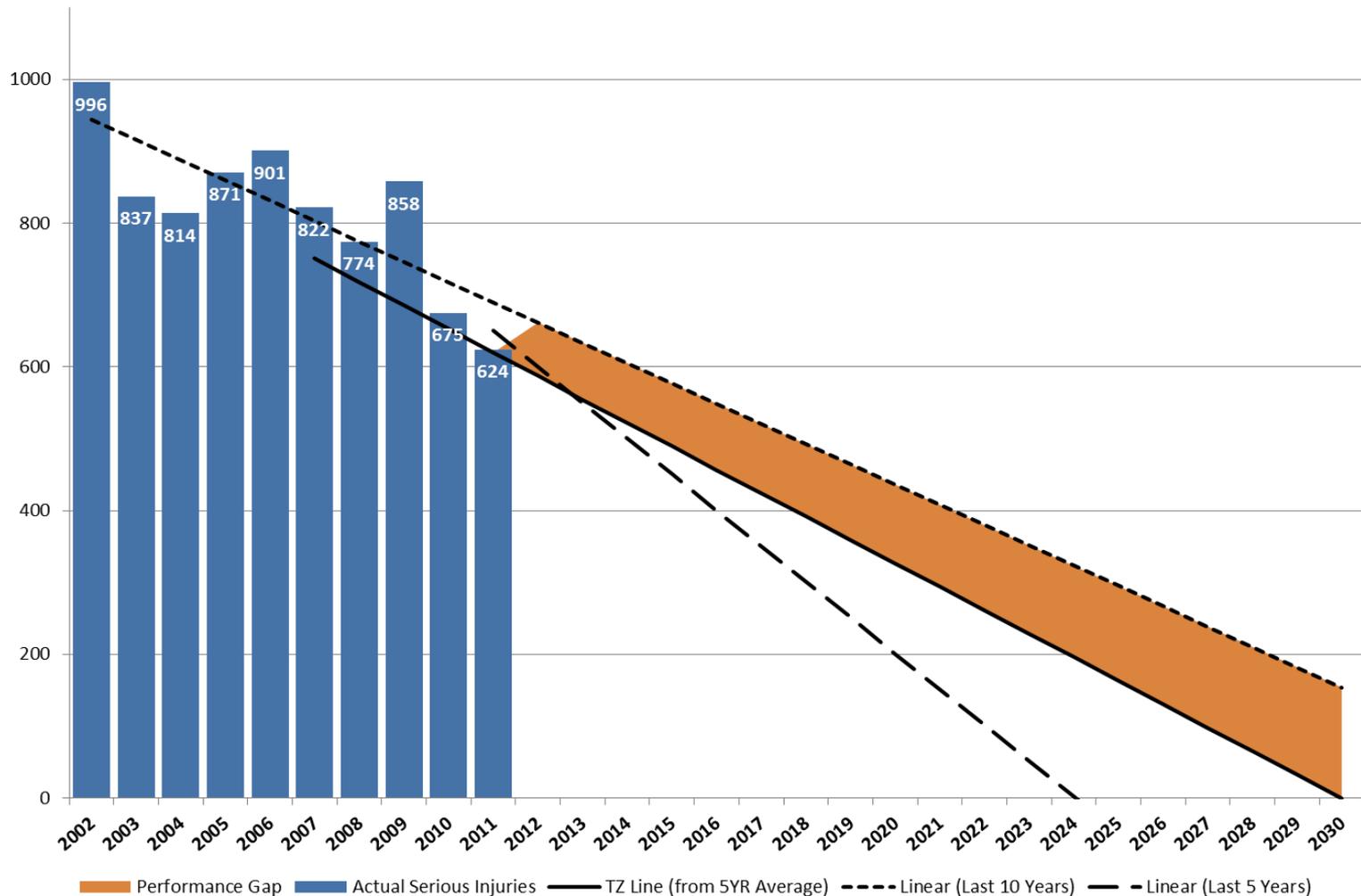


# P1: Run-Off-the-Road (CLAS)



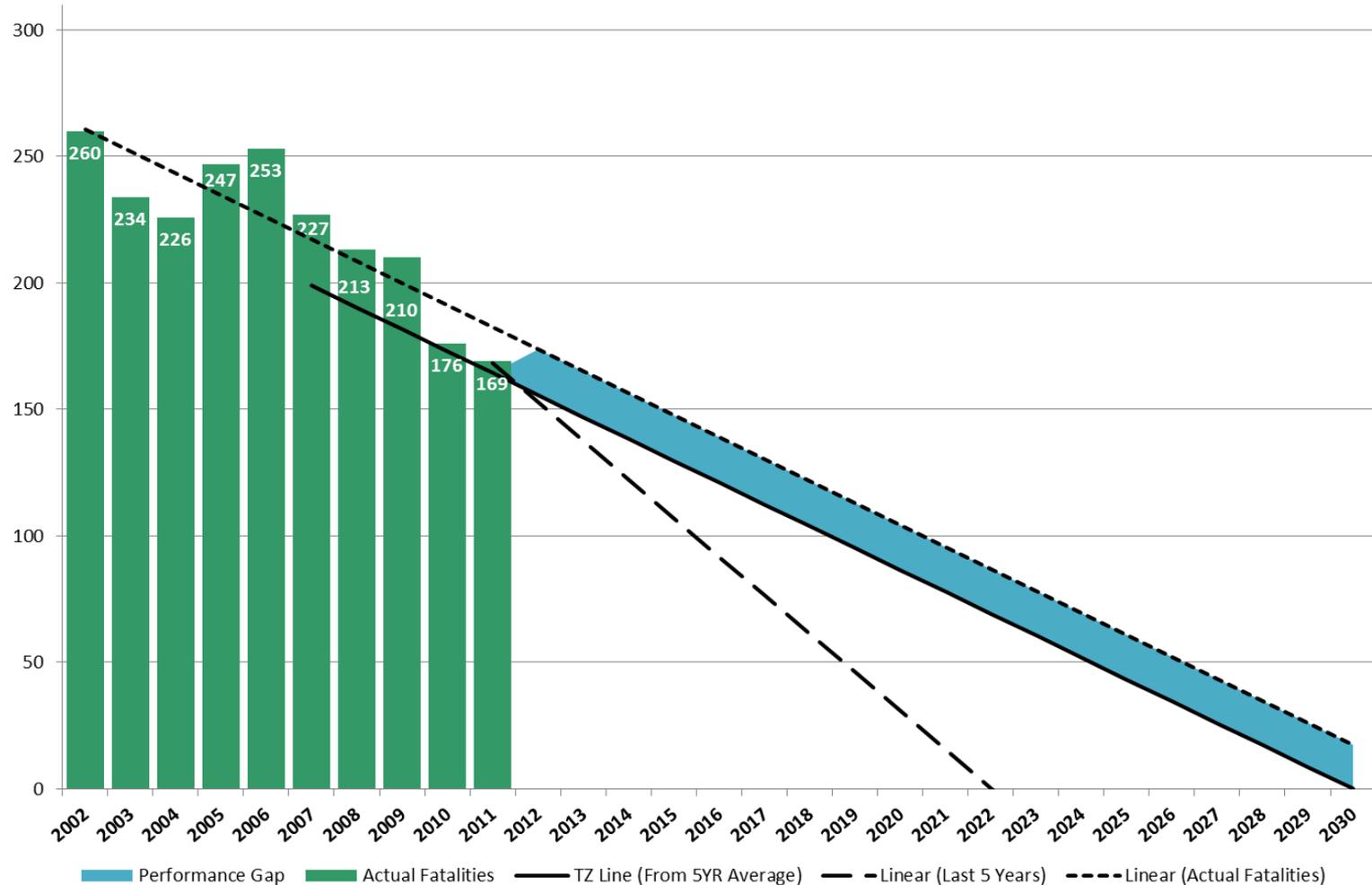
# P1: Run-Off-the-Road

Run-off-the-Road Serious Injuries 2002-2011

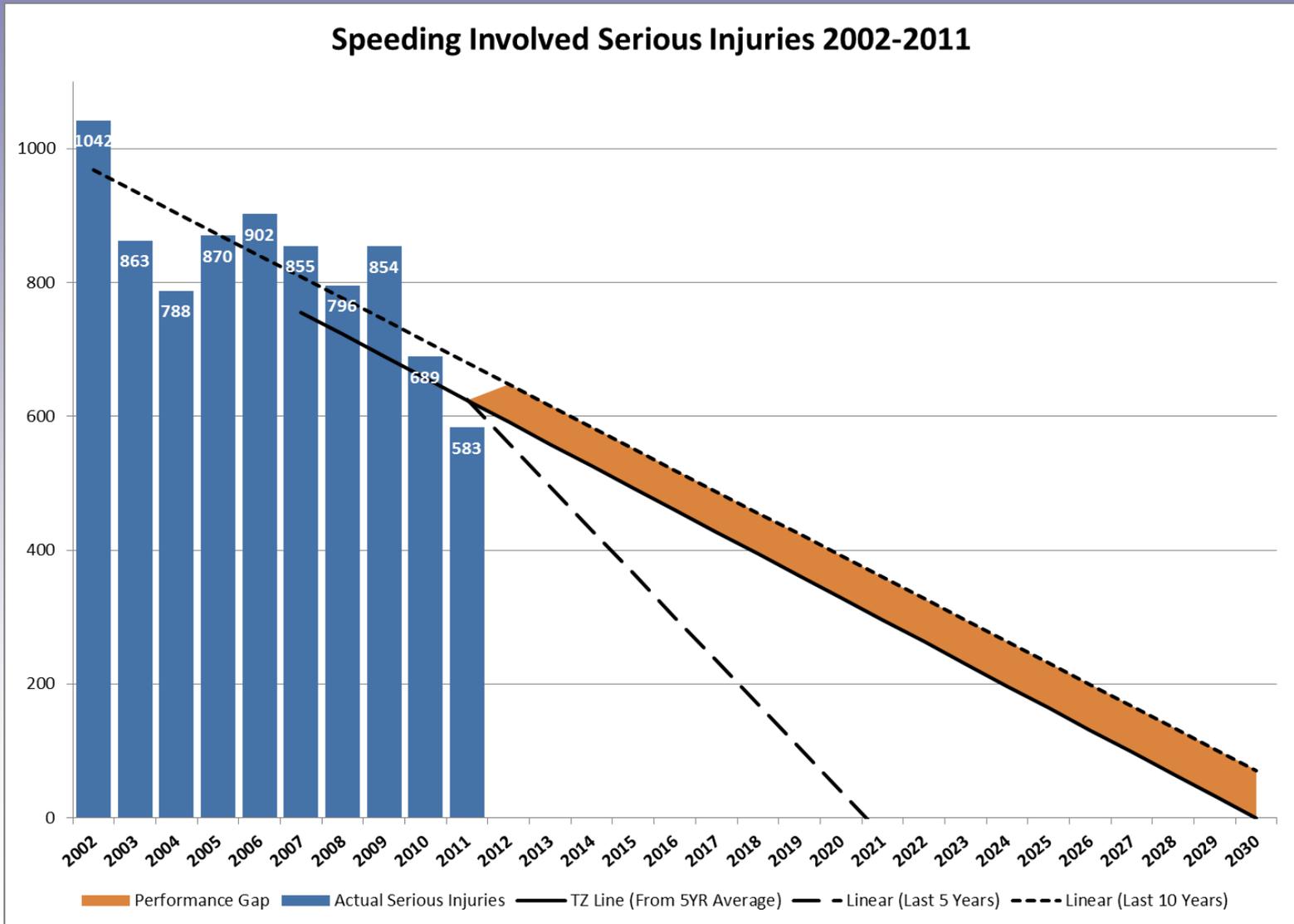


# P1: Speeding

## Speeding Involved Fatalities 2002-2011

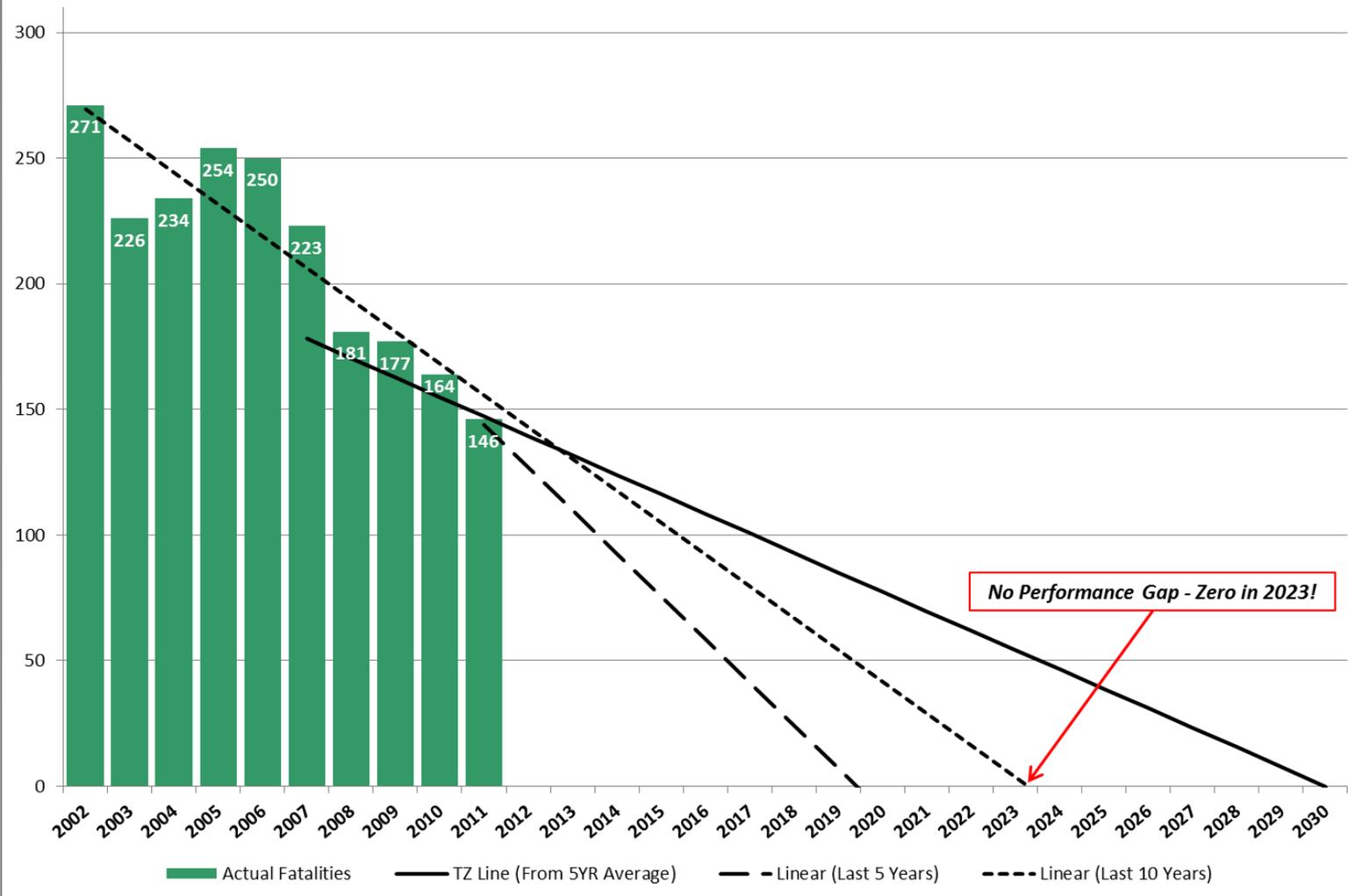


# P1: Speeding

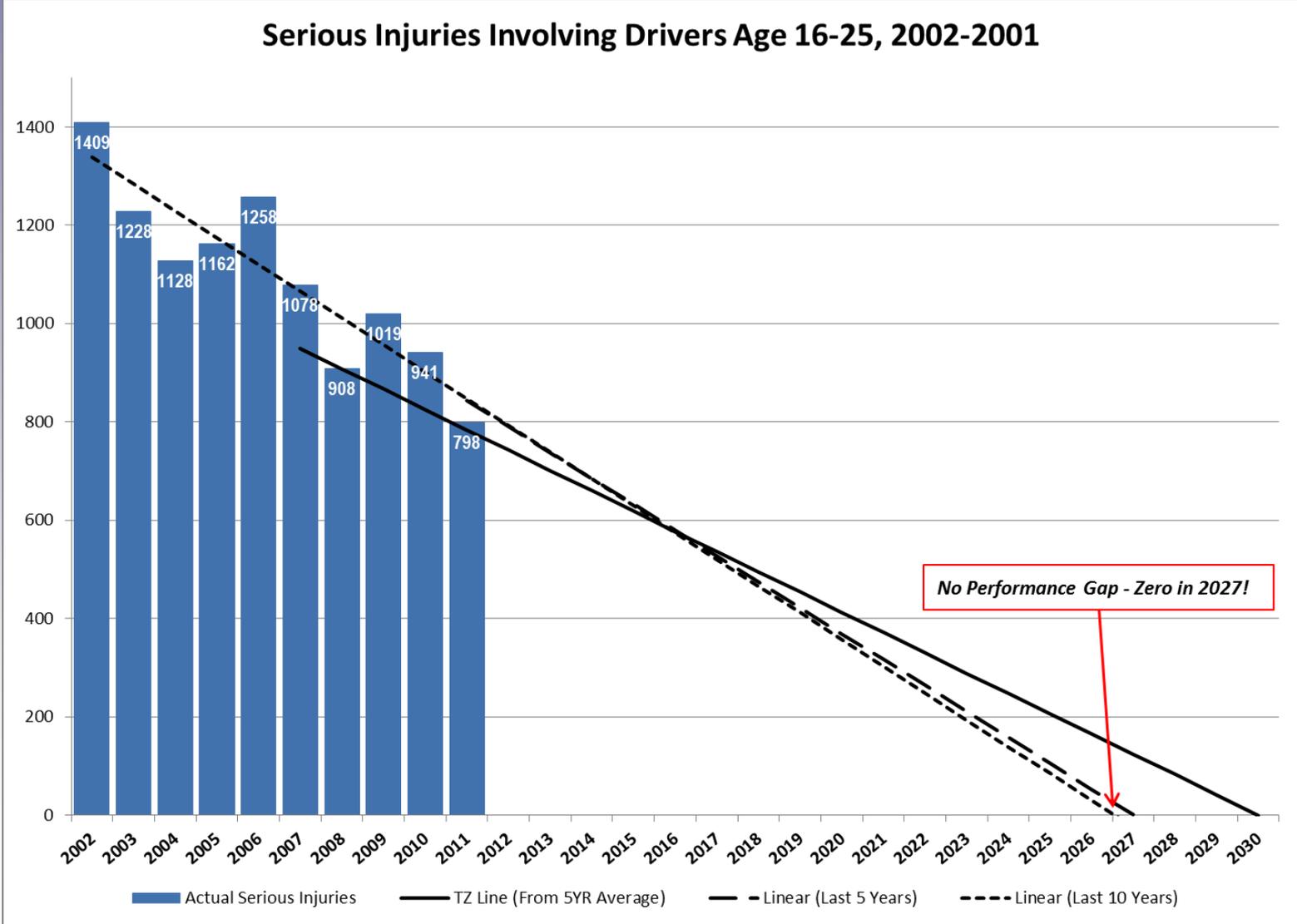


# P1: Young Drivers (16-25)

Fatalities Involving a Driver Age 16-25, 2002-2011

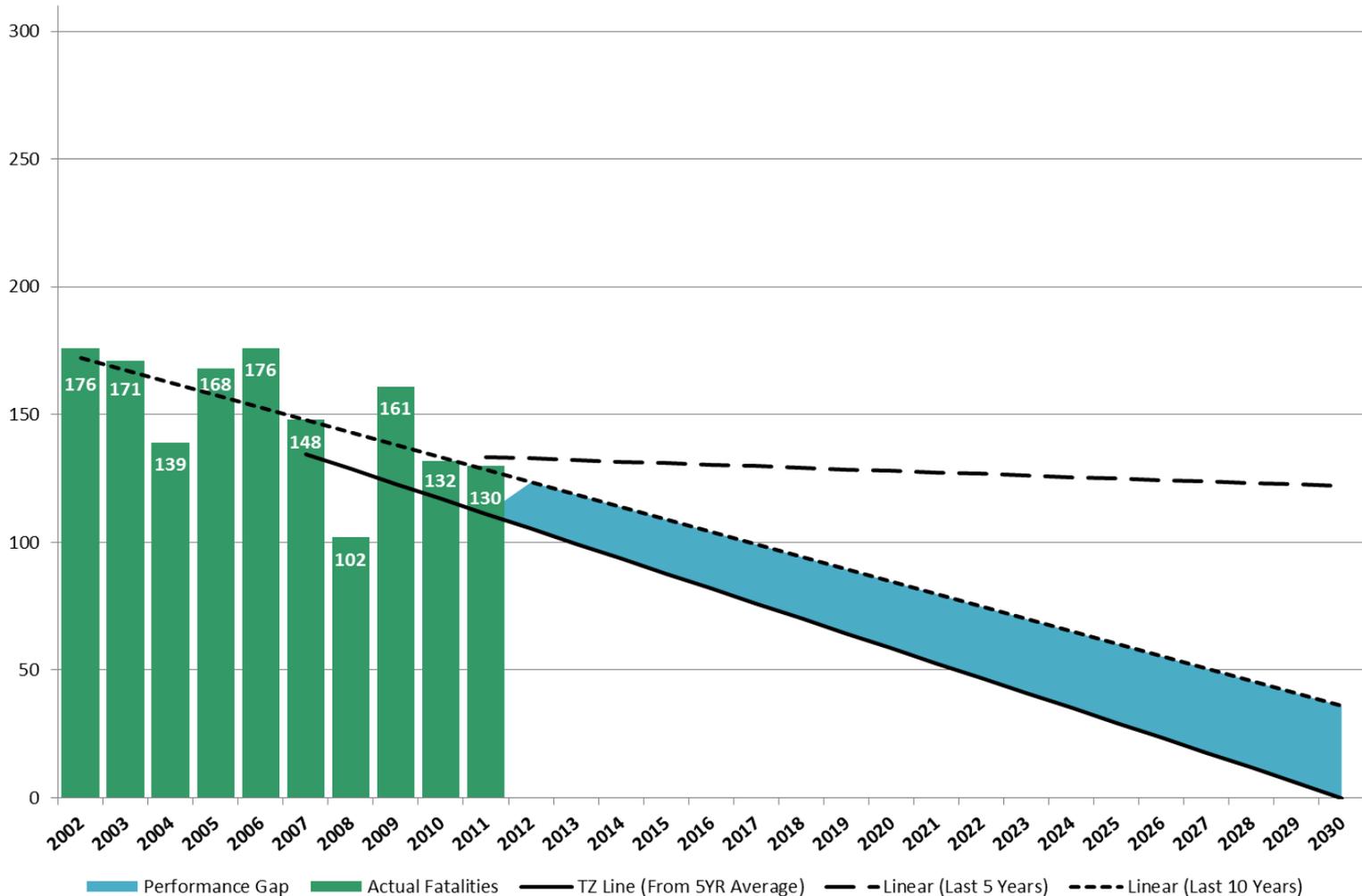


# P1: Young Drivers (16-25)



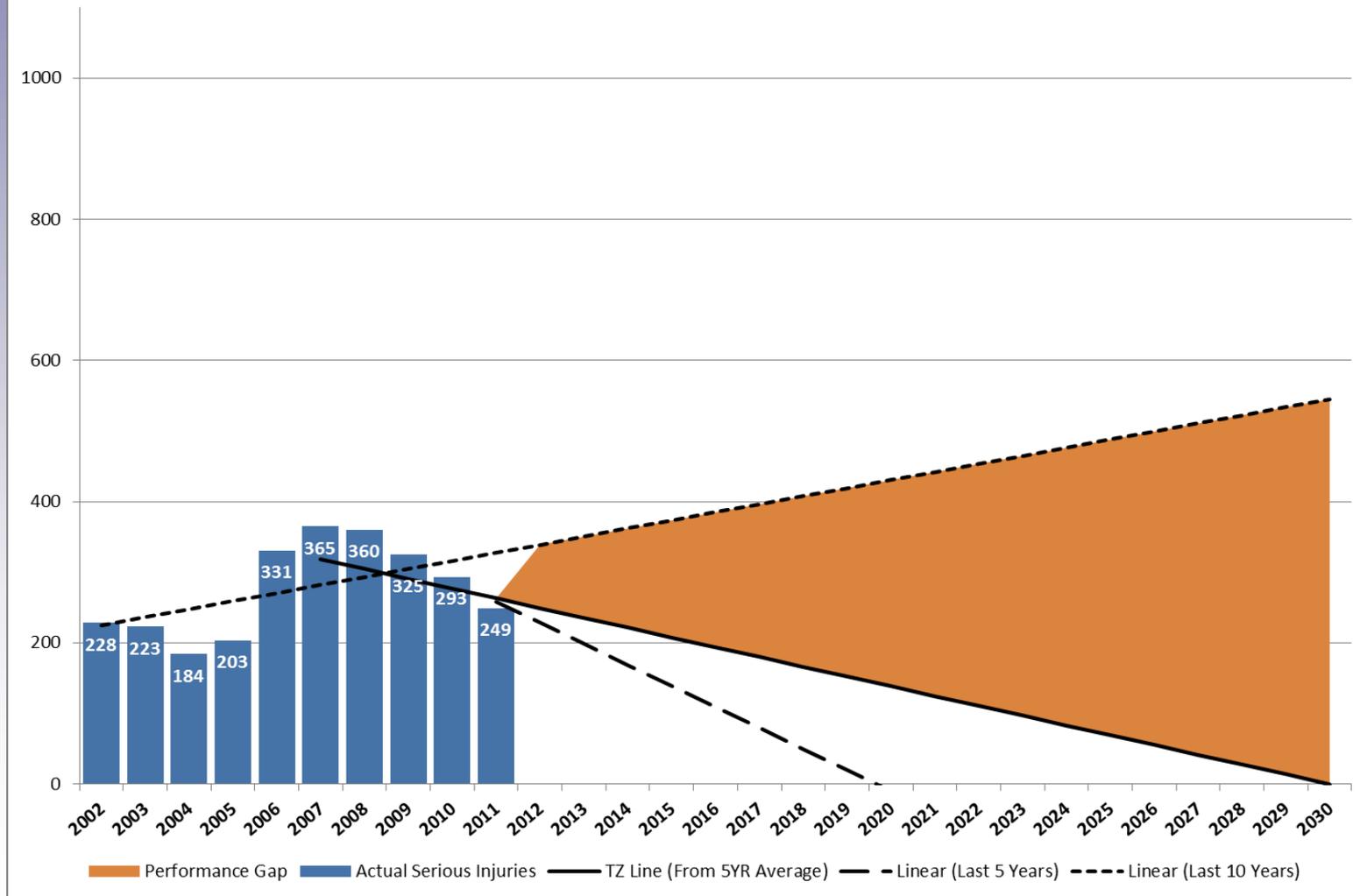
# P1: Distracted Drivers

## Distracted/Inattentive Driver Involved Fatalities 2002-2011



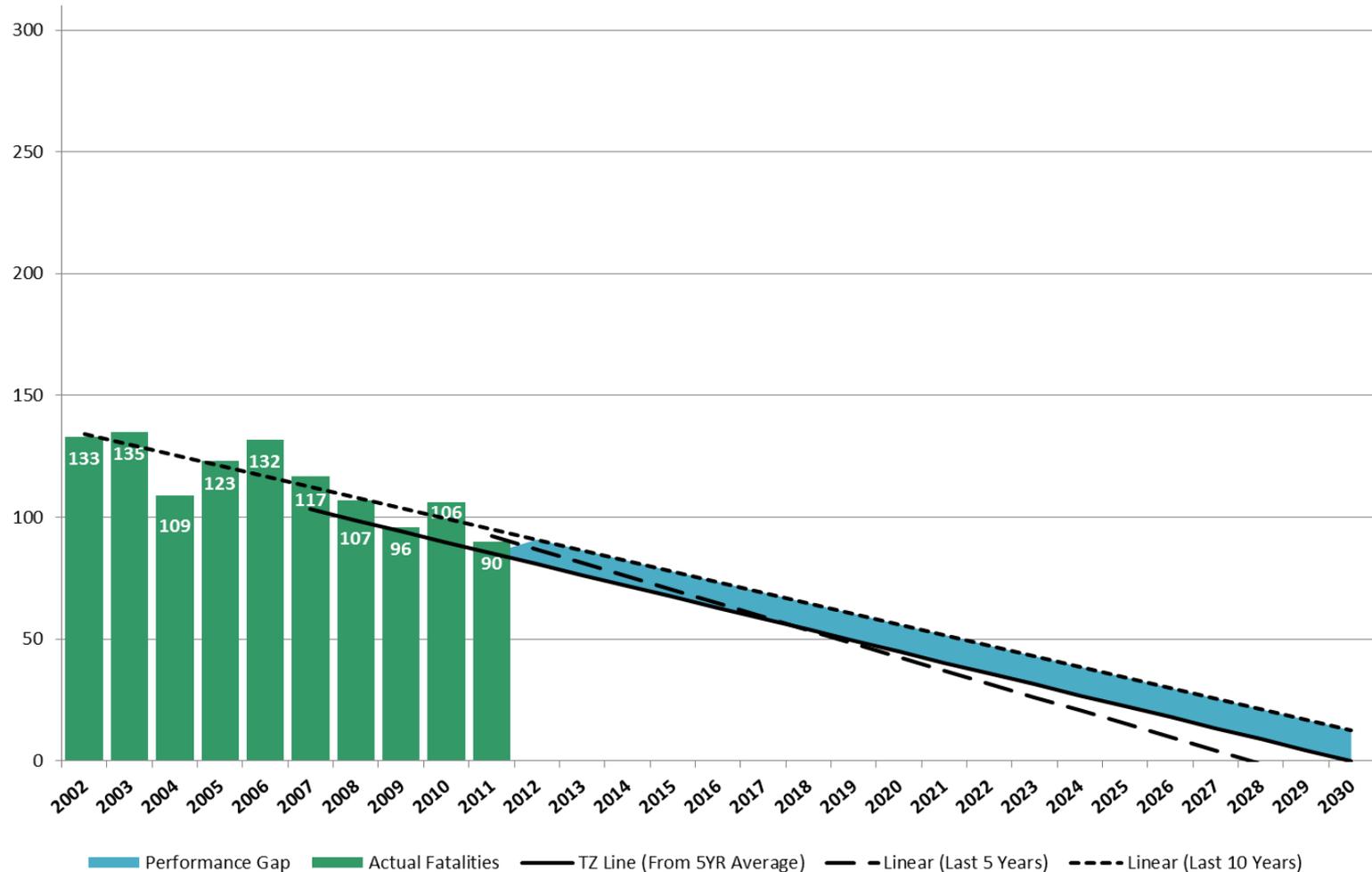
# P1: Distracted Drivers

## Distracted/Inattentive Driver Involved Serious Injuries 2002-2011

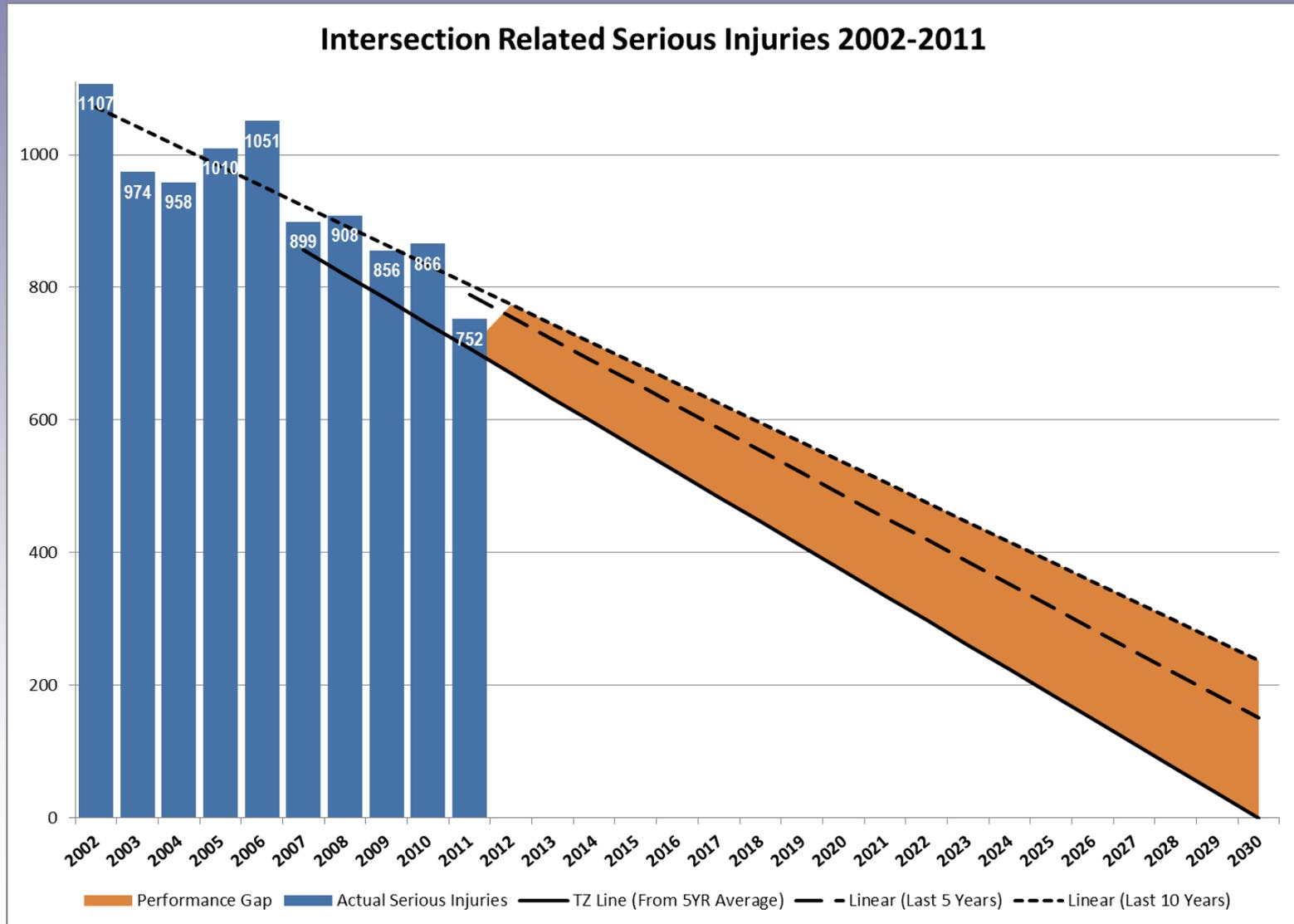


# P1: Intersections (CLAS)

Intersection Related Fatalities (from CLAS) 2002-2011



# P1: Intersections

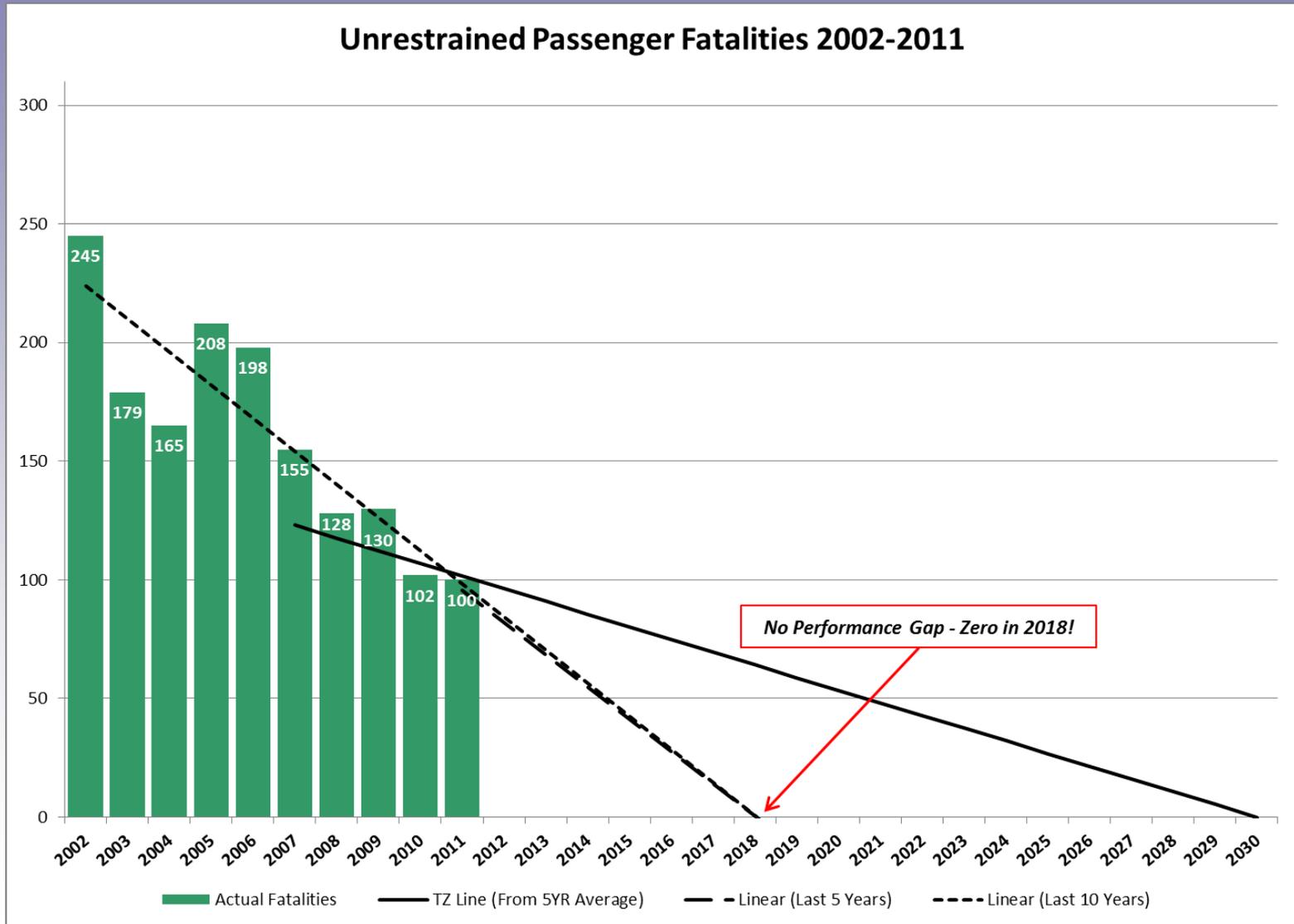


This is great!  
Show me some more data!

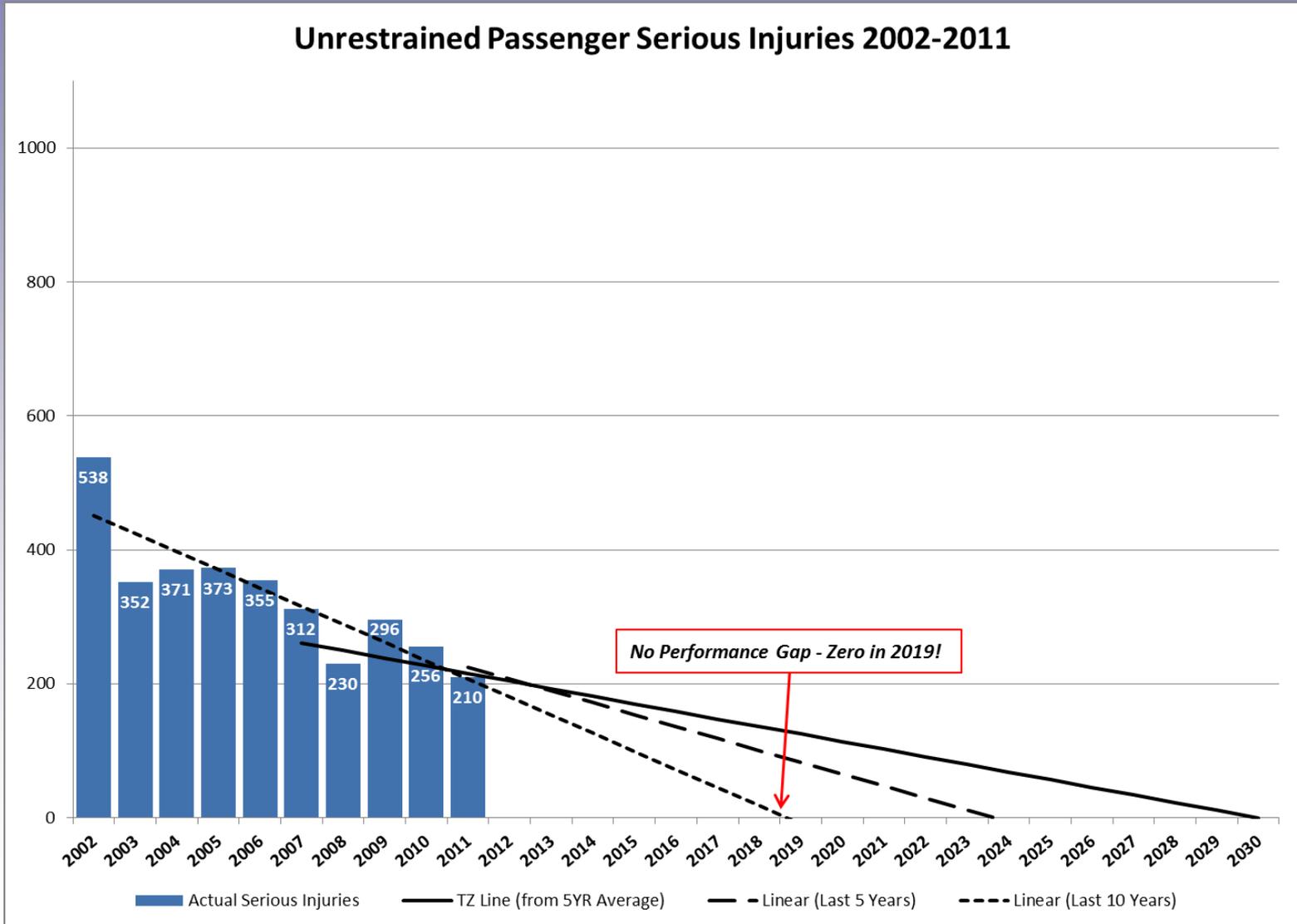


Priority Level 2

# P2: Unrestrained Passengers

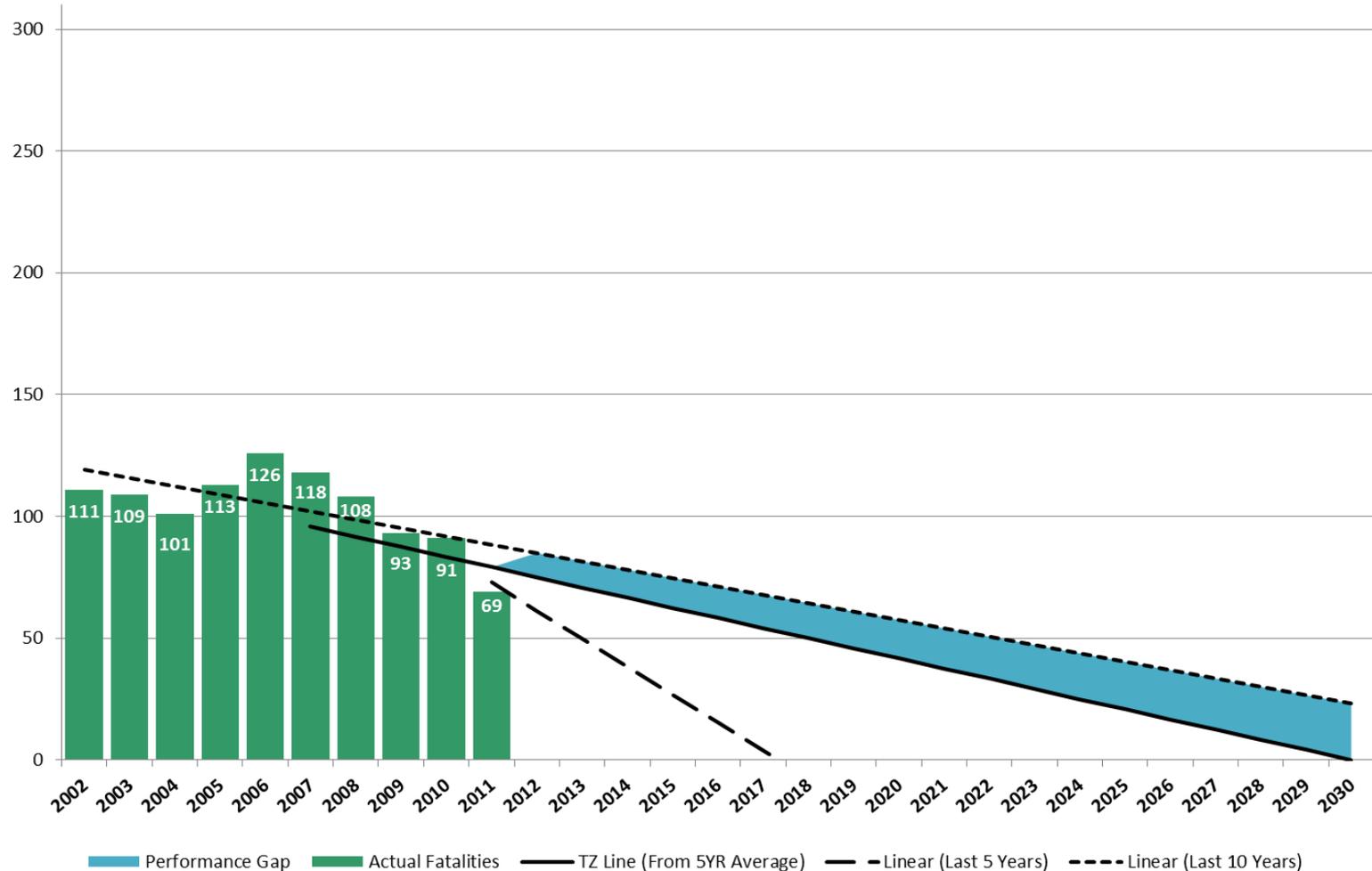


# P2: Unrestrained Passengers



# P2: Unlicensed Drivers

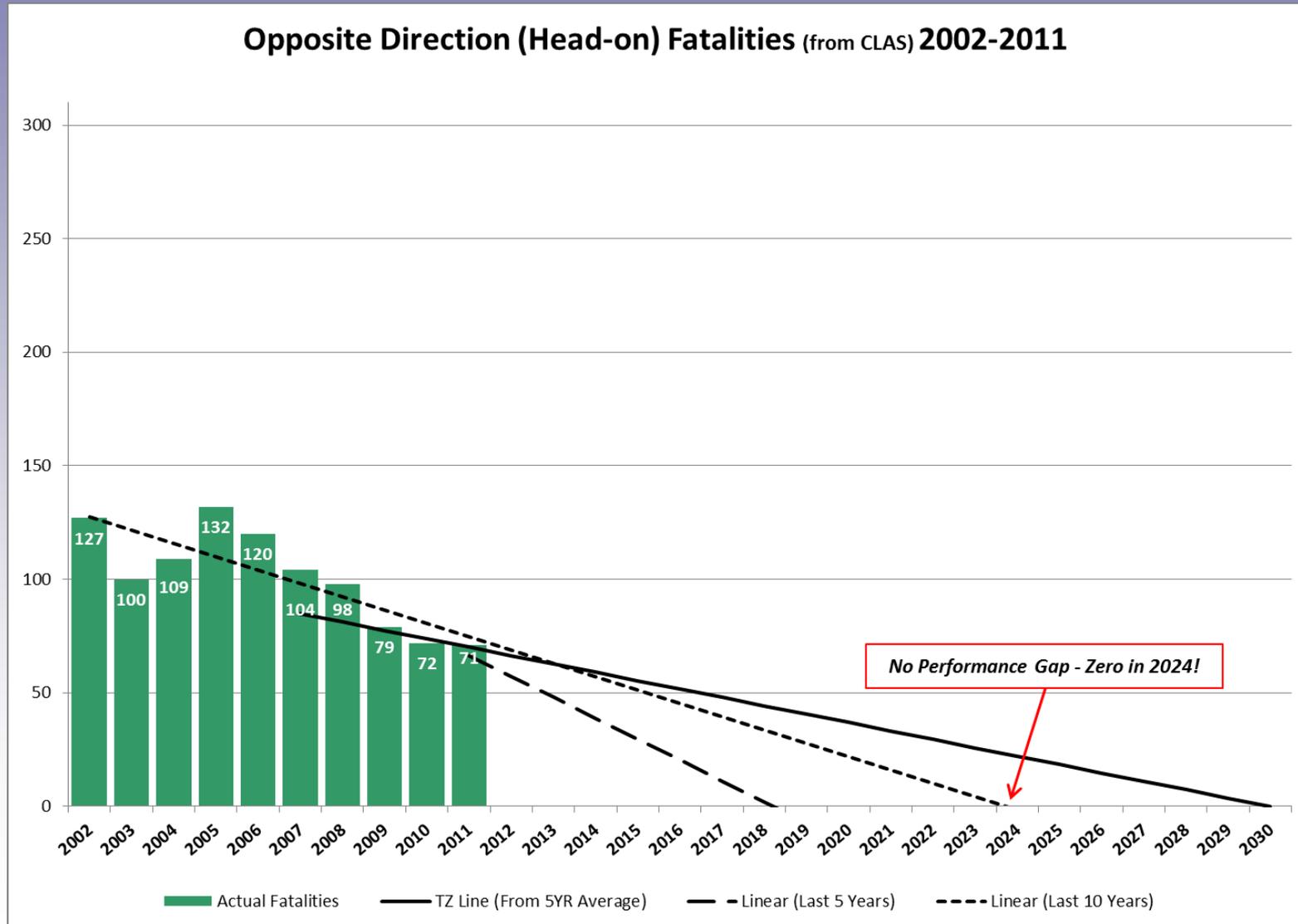
## Unlicensed Driver Involved Fatalities 2002-2011



# P2: Unlicensed Drivers

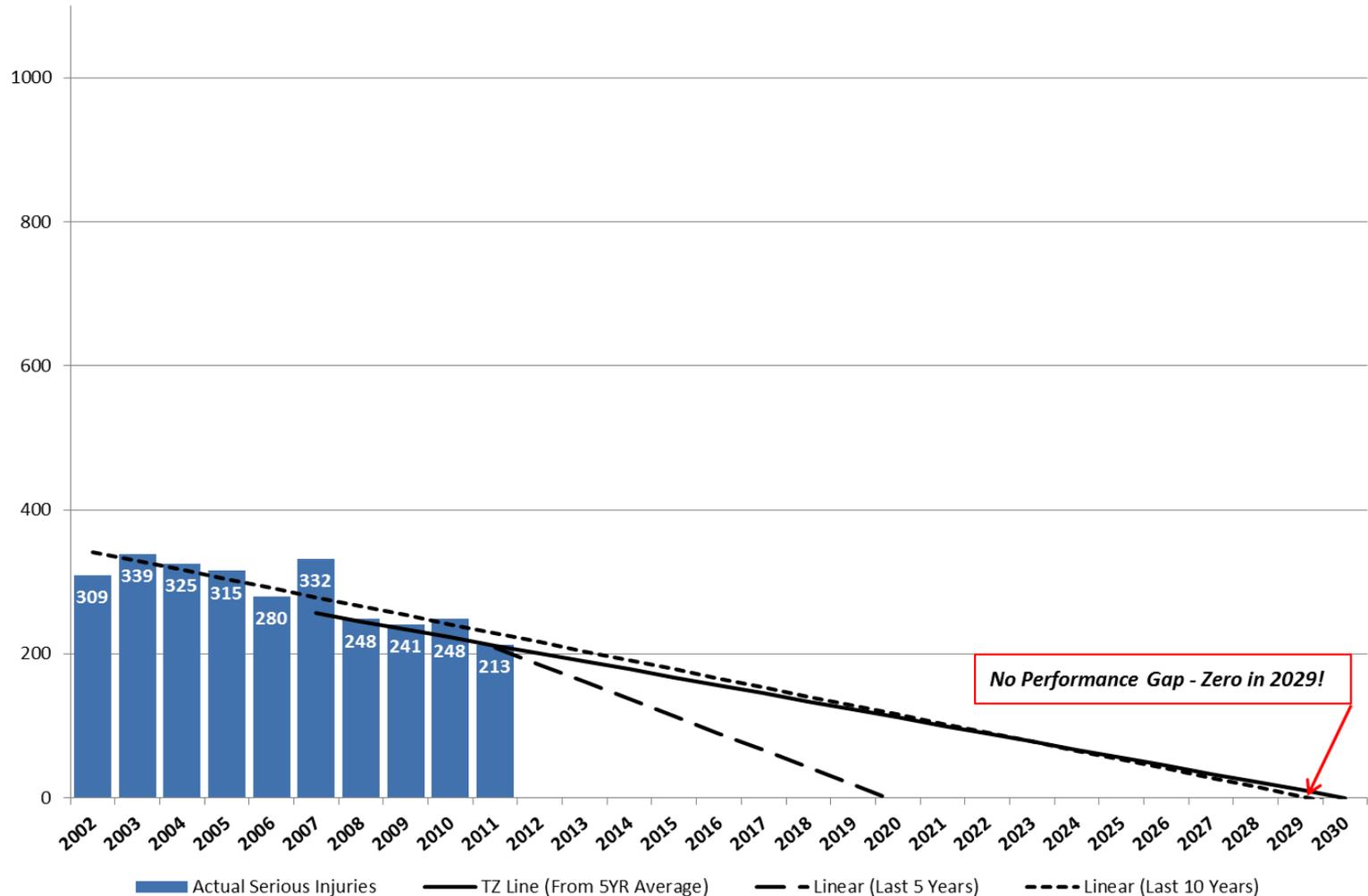
- At this time, license status is not available in CLAS.
  - Cannot measure serious injuries
- FARS is “linked” to license status through collaboration with Dept. of Licensing

# P2: Head-on Collisions (CLAS)



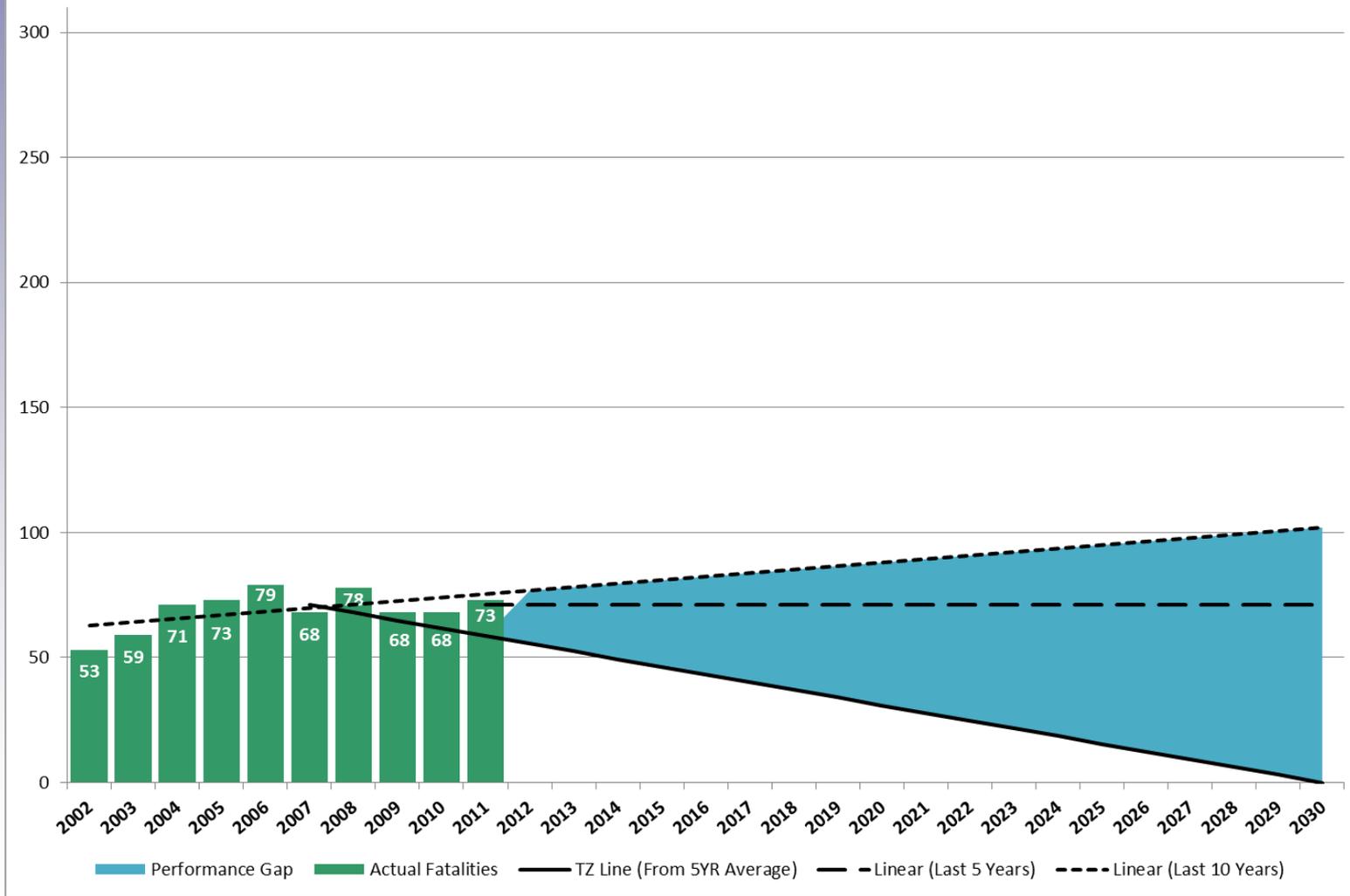
# P2: Head-on Collisions

## Opposite Direction (Head-on) Serious Injuries 2002-2011



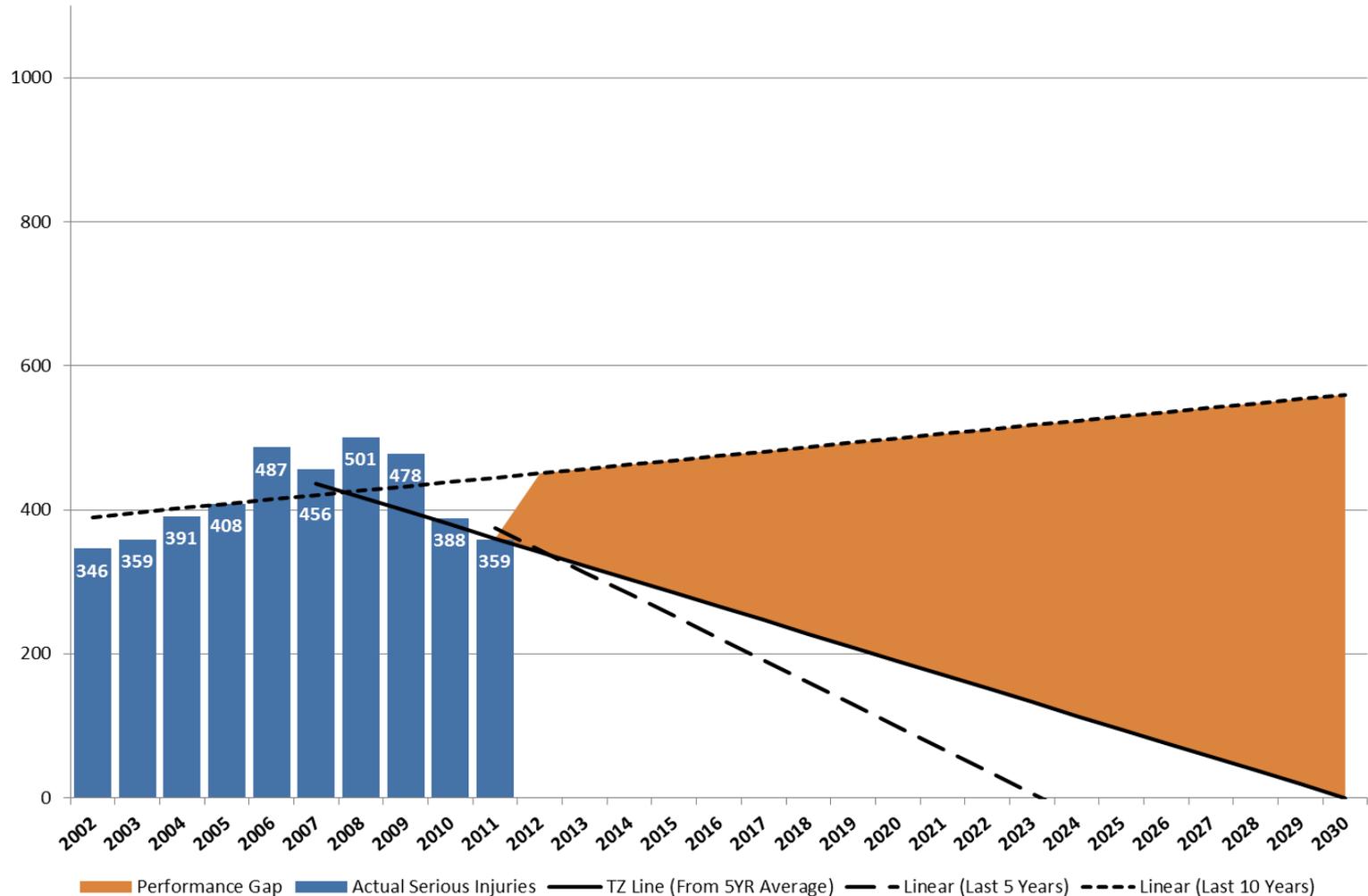
# P2: Motorcycles

## Motorcycle Involved Fatalities 2002-2011

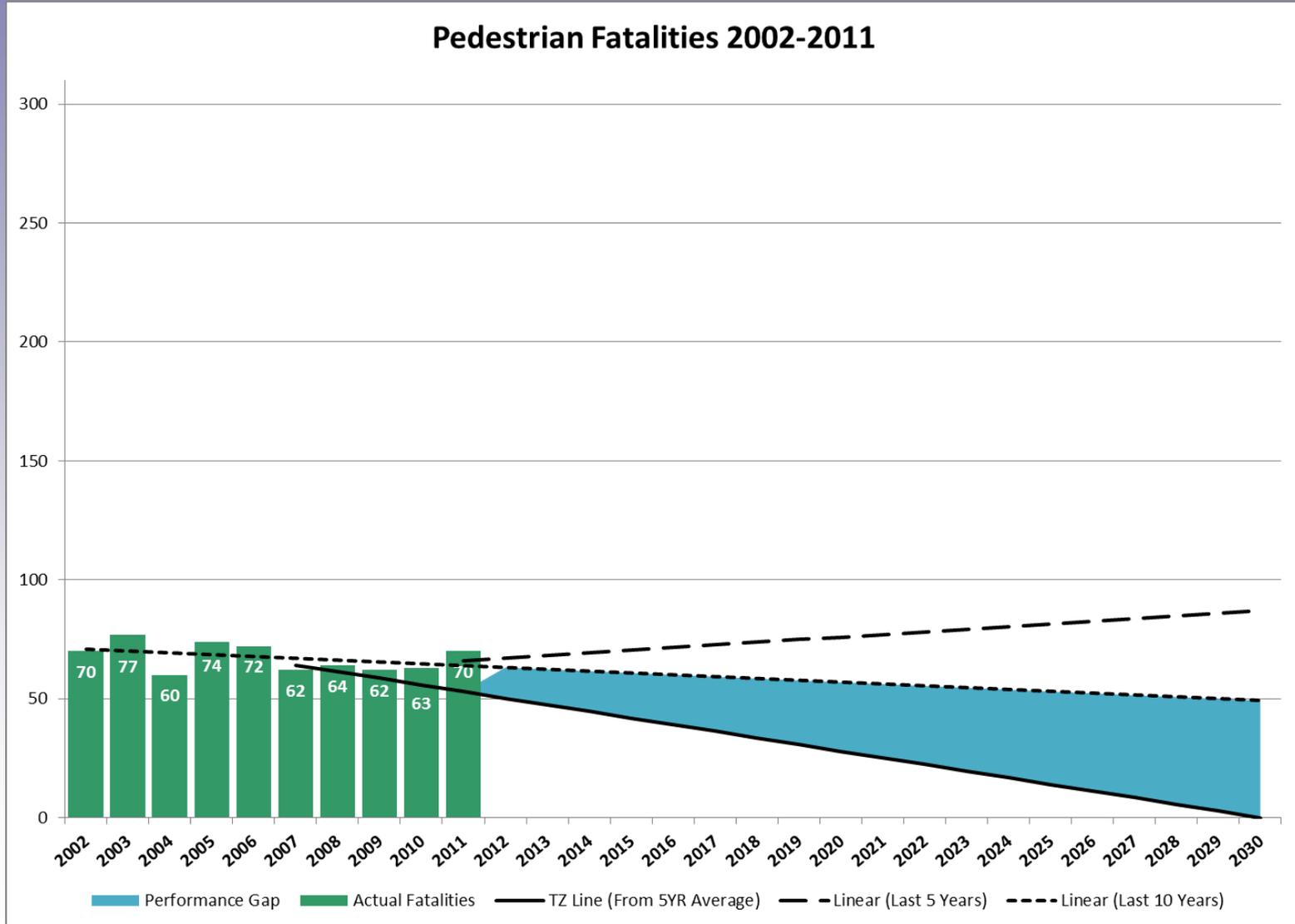


# P2: Motorcycles

## Motorcycle Involved Serious Injuries 2002-2011

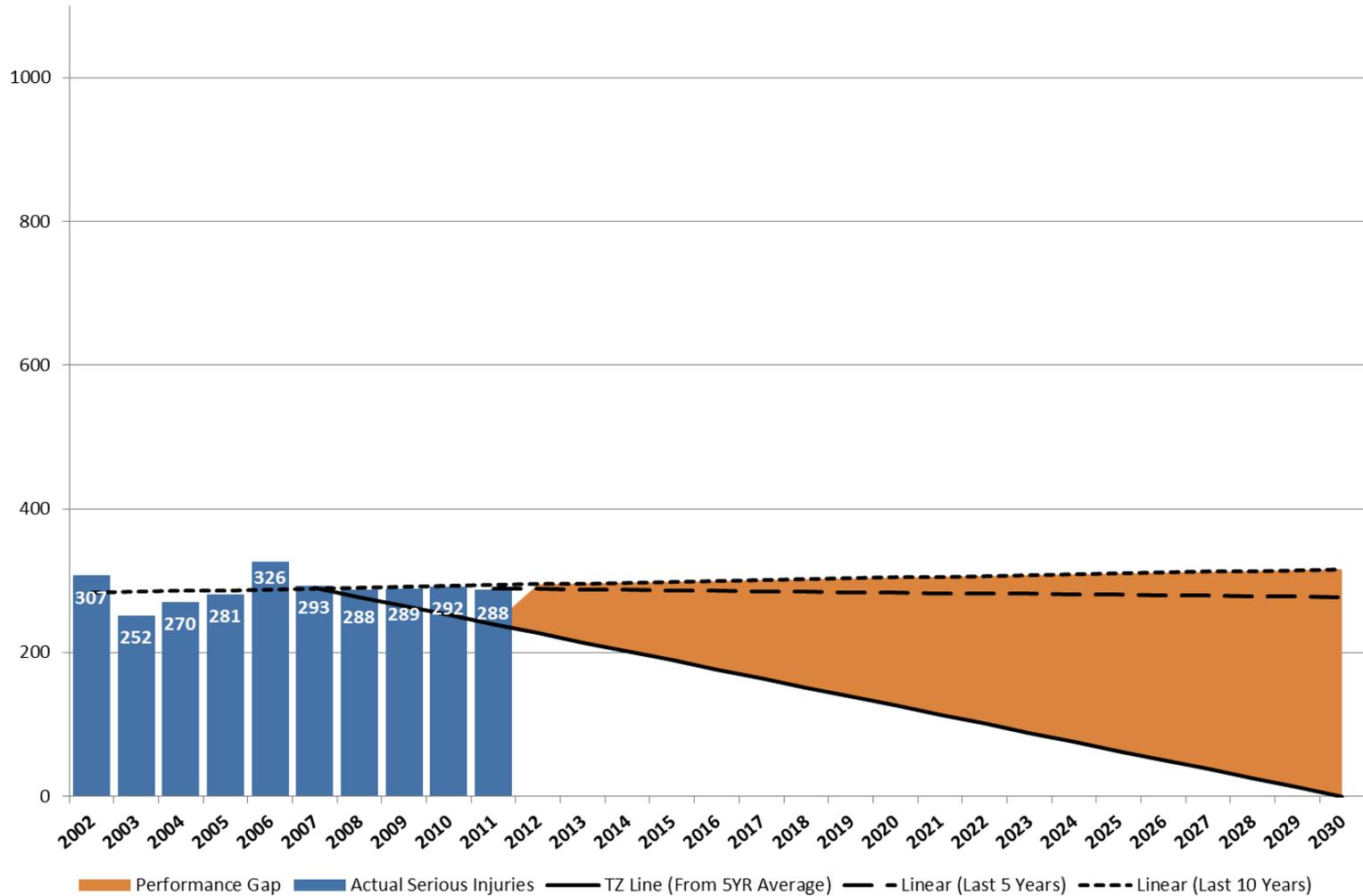


# P2: Pedestrians



# P2: Pedestrians

## Pedestrian Serious Injuries 2002-2011



# But My County is Different!

Washington Traffic Safety Commission

Home Programs & Priorities Research & Data Grants Traffic Laws Resources

Search the site Search

Changing driver behavior to end traffic deaths and serious injuries

Featured

- Governor Reappoints Traffic Safety Commission Director  
Darrin Grondel to continue position
- Results of the State's first-ever Drive Sober or Get Pulled Over Campaign Announced
- Washington Drivers Have Attitudes, Knowledge, and Awareness  
Statewide survey results released
- Traffic Safety Documentary Wins Award  
Traffic Safety Successes on the Colville Reservation

**For Law Enforcement**

- Order materials
- Funding Opportunities
- Fatality data by county
- Administrative forms

» More for Law Enforcement

**For Researchers**

- Total deaths year to date
- Target Zero overview
- Washington traffic safety facts
- Traffic safety priorities for local jurisdictions

» More for Researchers

**Your Community**

- Your local traffic safety task force
- Traffic citation? Look up a law.
- Keep kids' routes to school safe
- Concerned about a local roadway? Find out if the corridor program can help.

» More for Citizens

# Traffic Safety Priorities for Local Jurisdictions

- This report reorders traffic safety priorities for the following jurisdictions:
  - Counties
  - Regional transportation planning organizations (RTPO)
  - Cities with populations greater than 30,000

## **City of Bremerton**

### Local Traffic Safety Priorities

							2006-2010 Total	
Number of Traffic Fatalities	2006	2007	2008	2009	2010	Number	% of Total	
Total Fatalities	1	2	2	2	0	7	100.0%	
Fatality Rate (per 100 million VMT)	**	**	**	**	**	**		
<b>Priority One</b>								
Young Driver Age 16-25-Involved	0	1	1	2	0	4	57.1%	
Pedestrian	0	1	1	1	0	3	42.9%	
<b>Priority Two</b>								
Run Off the Road†	0	1	1	0	0	2	28.6%	
Intersection Related†	1	1	0	0	0	2	28.6%	
Unlicensed Driver-Involved	0	0	1	1	0	2	28.6%	
Traffic Data Systems	**	**	**	**	**	**	**	
<b>Priority Three</b>								
Speeding-Involved	0	1	0	0	0	1	14.3%	
Opposite Direction Multi-vehicle†	0	0	0	1	0	1	14.3%	
Motorcyclist	0	1	0	0	0	1	14.3%	
Older Driver-Involved (age 75+)	1	0	0	0	0	1	14.3%	
Drowsy Driver-Involved	0	0	1	0	0	1	14.3%	
Emergency Medical Services	**	**	**	**	**	**	**	
<b>Priority Four</b>								
Impaired Driver-Involved	0	0	0	0	0	0	0.0%	
Unrestrained Passenger Vehicle Occupant	0	0	0	0	0	0	0.0%	
Distracted Driver-Involved	0	0	0	0	0	0	0.0%	
Heavy Truck-Involved (GVWR > 10,000 lbs.)	0	0	0	0	0	0	0.0%	
Bicyclist	0	0	0	0	0	0	0.0%	
Work Zone	0	0	0	0	0	0	0.0%	
Wildlife	0	0	0	0	0	0	0.0%	
Vehicle-Train	0	0	0	0	0	0	0.0%	
School Bus-Involved	0	0	0	0	0	0	0.0%	
Aggressive Driver-Involved	**	**	**	**	**	**	**	
Integrated Interoperable Communications	**	**	**	**	**	**	**	

# Data is Our World!

- Priority setting is driven by data, the **numbers** show us where to go!

BUT....

- The **trends** show us where we've been and drive the future!
  - Flattening trends are a glimpse into the future; a callout for innovative, effective strategies!

# You need data? We got you!

Staci Hoff, PhD  
Research Manager  
(360) 725-9874  
shoff@wtsc.wa.gov

Dick Doane, MA  
Research Investigator  
(360) 725-9894  
ddoane@wtsc.wa.gov





# **FUTURE CHALLENGES AND OPPORTUNITIES**



# **THE BIGGEST ENGINEERING CHALLENGES**

John Nisbet  
State Traffic Engineer, WSDOT



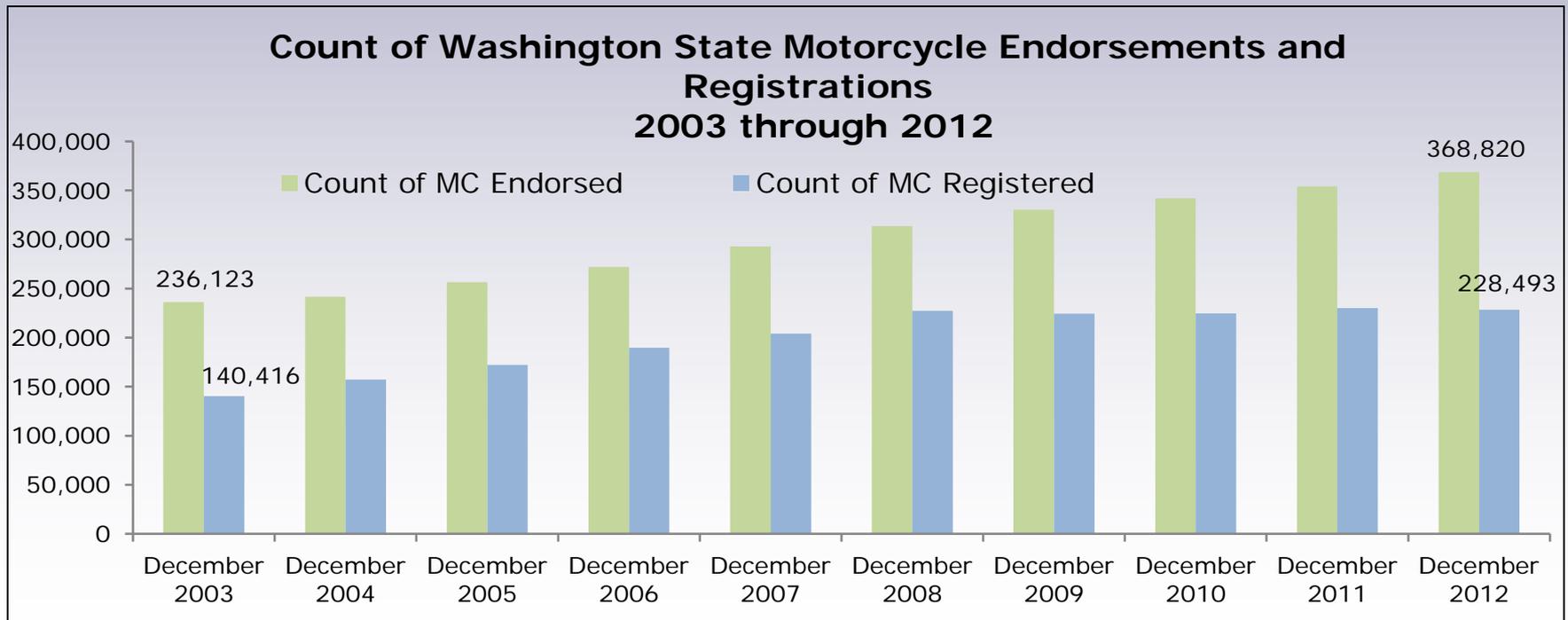
# WASHINGTON STATE MOTORCYCLE SAFETY PROGRAM: HISTORICAL OVERVIEW

Teresa Berntsen  
Deputy Director, DOL

# A Growing Population

In the last ten years:

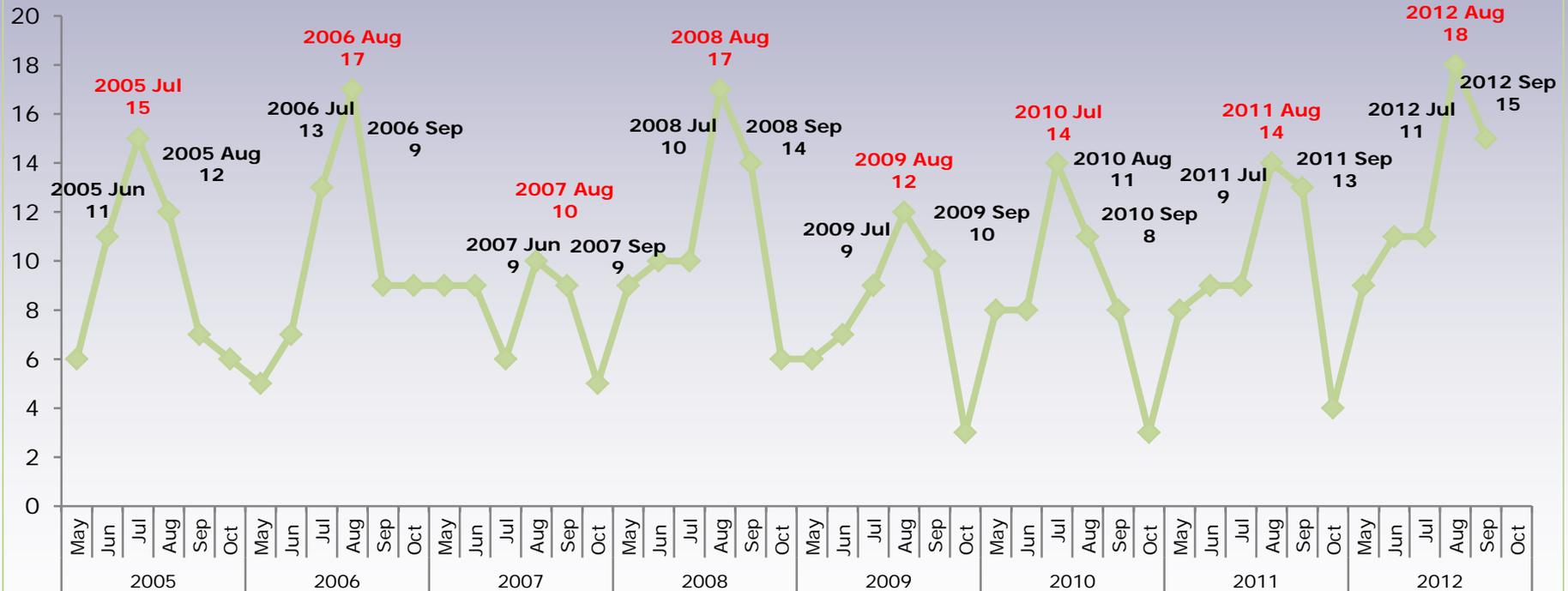
- Motorcycle endorsements have grown 56%
- Motorcycle registrations have grown by 63%
- Driver licenses have grown by 16%
- Passenger car registrations have increased by 12%



# Seasonality

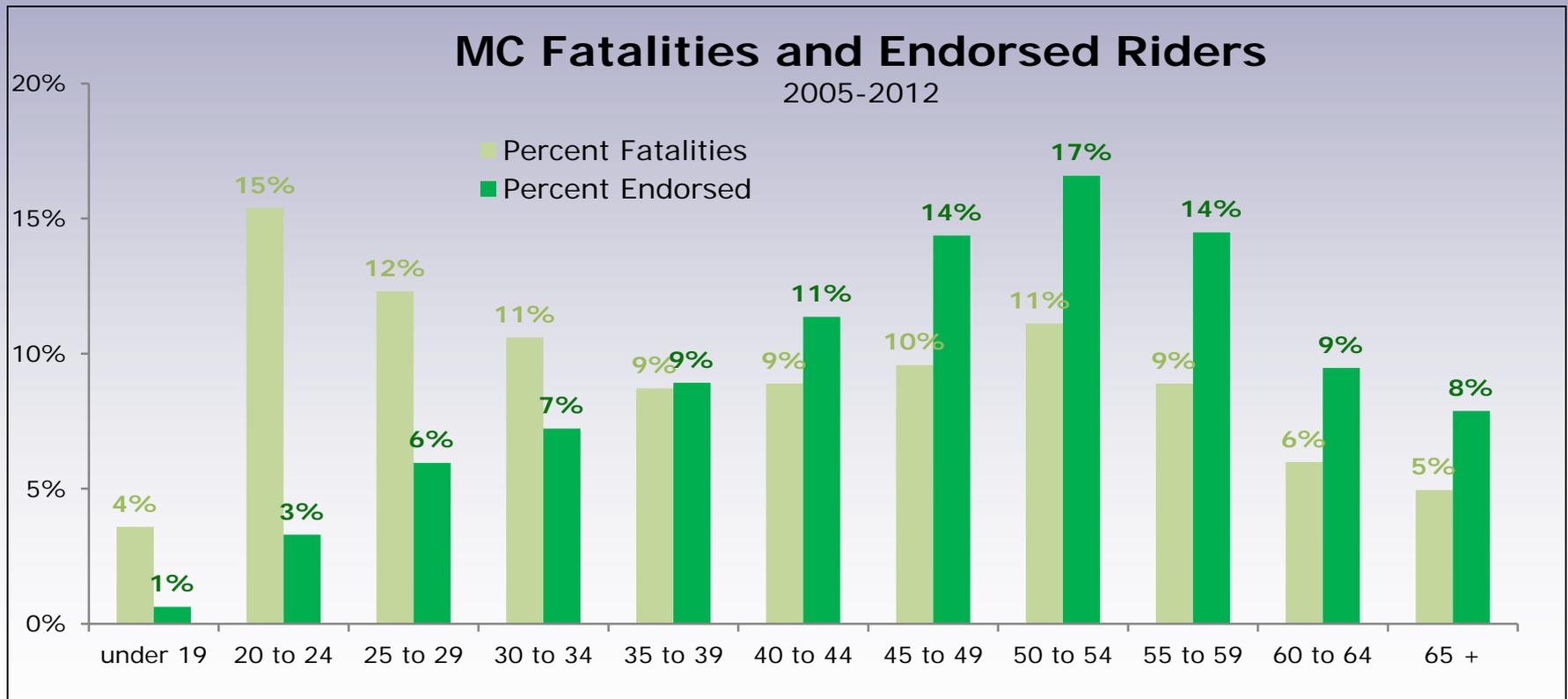
July – September each year motorcycle fatalities increase as usage increases.

History of Motorcycle Fatalities



# Problem Age Groups

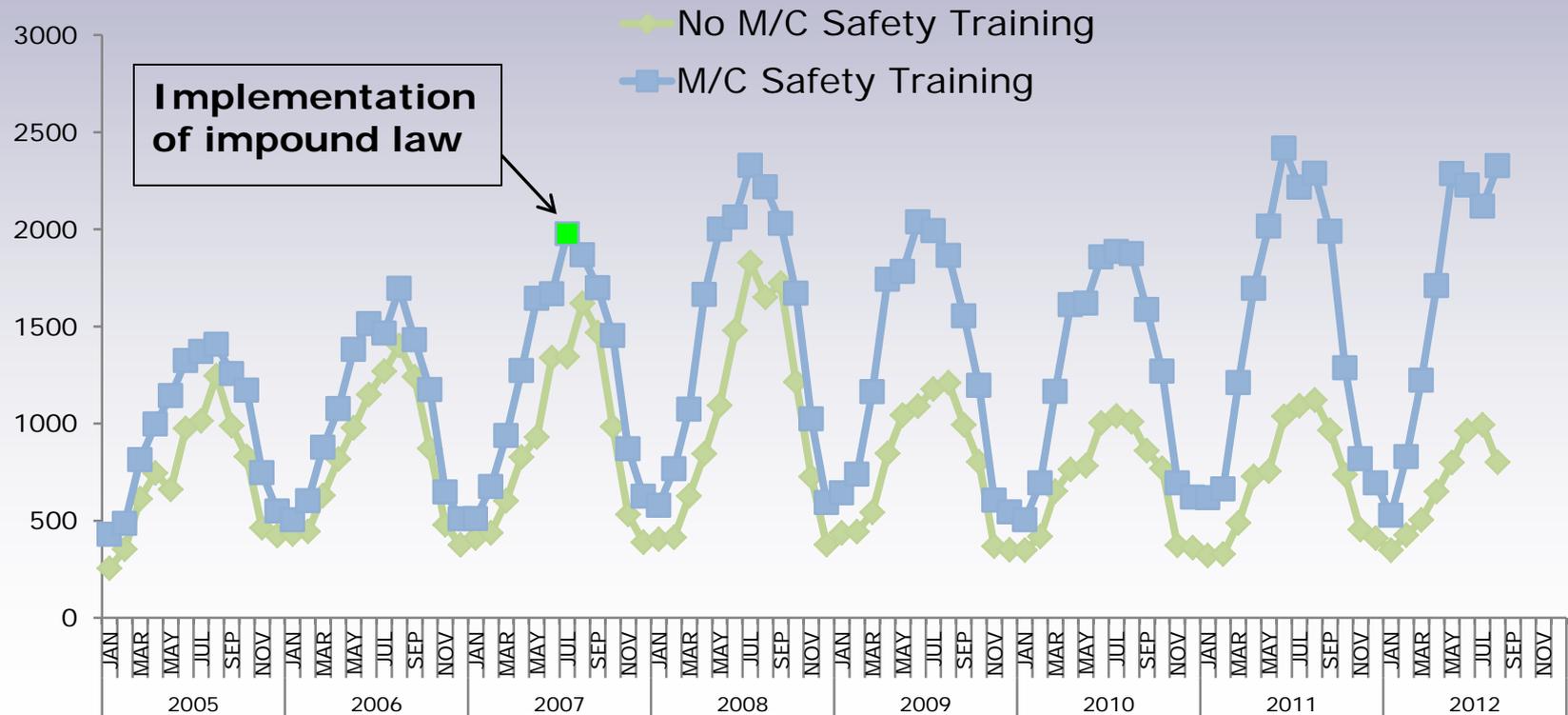
- Young riders are over represented in fatal crashes relative to endorsement status
- Middle-aged riders have high rates of fatal crashes, but are not over represented relative to endorsements



# Impound Law

- 2007 law change allows bike to be impounded if stopped found not to have motorcycle endorsement.
- Law pushed more riders to get endorsed. Currently, over 60% of newly endorsed riders have completed training

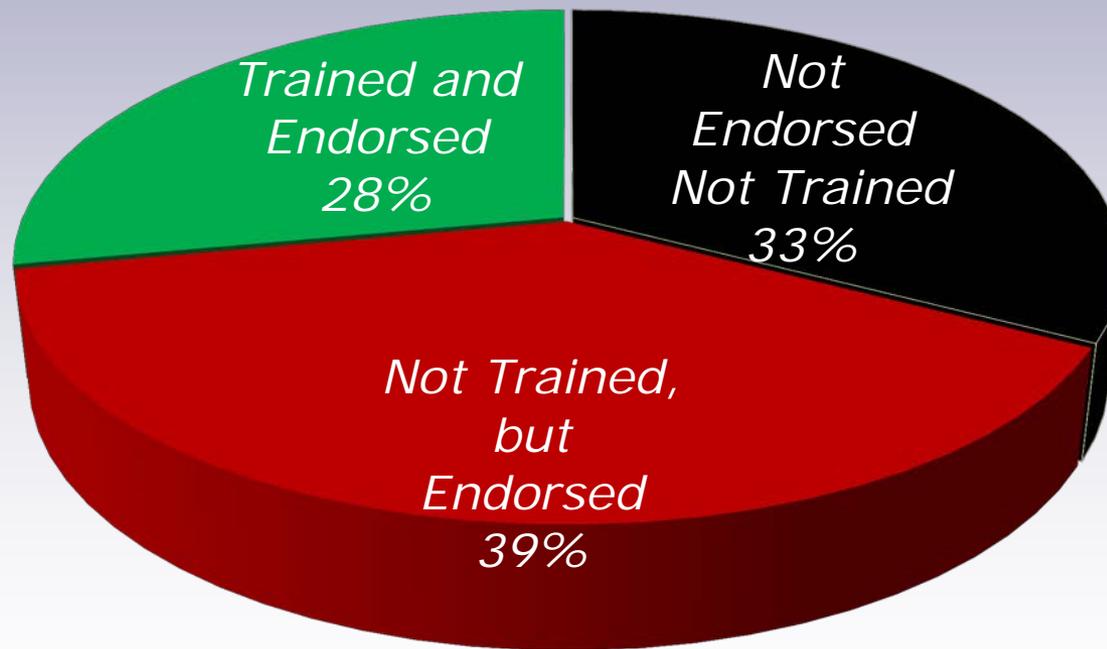
Training Types for New Motorcycle Endorseees



# Opportunities to Better Prepare Riders

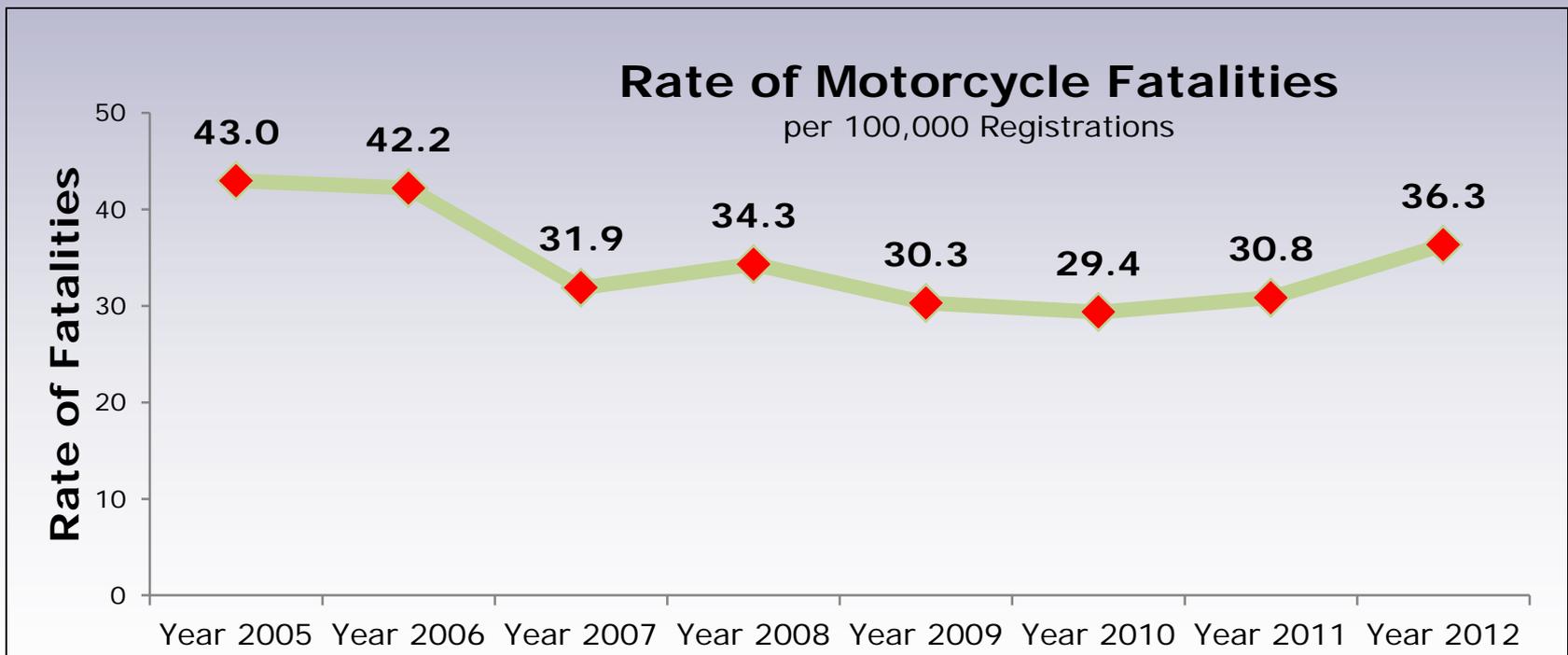
Riders without formal training are over-represented in the number of fatal collisions

**Motorcycle Endorsement Status  
2012 Fatalities**



# The big picture

- Even with the increasing number of riders, the rate of fatalities has declined since 2005
- Weather plays a role. We had an exceptionally hot, dry, clear summer.



# Summary of Facts

- Growing population
- Percent of new riders who are trained has grown
- Untrained riders in fatal crashes are over represented
- Young riders are over represented in fatal crashes relative to endorsement status
- Even with the increasing number of riders, the rate of fatalities has declined since 2005



# **CHALLENGES WITH NEW MARIJUANA LAWS**

Lieutenant Rob Sharpe  
Washington State Patrol



**LUNCH**

Please return by 12:30 p.m.



# STRATEGY DISCUSSIONS

Facilitated by:  
Target Zero Project Team

# Strategy Stations

- Alcohol and/or Drug Impaired Driver
- Speeding-Involved
- Young Driver Age 16-25-Involved
- Distracted Driver-Involved, Drowsy Driver-Involved
- Run Off the Road, Intersection Related, Opposite Direction Multi-vehicle
- Traffic Data Systems, Emergency Medical Services and Trauma System
- Unrestrained Passenger Vehicle Occupant and Unlicensed Driver-Involved
- Motorcyclist
- Pedestrian and Bicyclist
- Older Driver-Involved, Heavy Truck-Involved, School Bus-Involved, Wildlife, Vehicle-Train, Work Zone
- Making Target Zero easier to use



# **GALLERY WALK**

Debbie Rough-Mack



**THANK YOU!**

Darrin Grondel  
WTSC Director