



### GUIDEPOST

- I-270 SB LANE ADDITION DATA ON PAGE 19
- FREEWAY MOBILITY DECLINED DESPITE OVERALL VOLUME DROPS WITH SEVERE WINTER WEATHER NEGATIVELY IMPACTING TRAVEL ON ALL ROUTES
- ARTERIAL MOBILITY REMAINED CONSISTENT WITH JANUARY 2013, BUT THERE WERE OCCASIONAL FLUCTUATIONS CAUSING HIGHER TRAVEL TIMES
- A NEW REGIONAL VOLUME COMPARISON USING SENSORS FROM ALL THE INTERSTATES IS ON PAGE 21
- AN ITS DEVICE STATUS REPORT IS ON PAGE 22 HIGHLIGHTING THE DEVICE UP/DOWN TIME AND THE HEALTH OF THE SYSTEMS DIRECT IMPACT ON REGIONAL MOBILITY
- PREPARATIONS BEGAN THIS MONTH FOR THE CITY-ARCH-RIVER PARK OVER-THE-HIGHWAY PROJECT.



A TRACTOR TRAILER CARRYING LARGE COILS OF STEEL OVERTURNED ON JANUARY 13, 2014, AT THE RAMP FROM WB I-64 TO WB I-70 IMPACTING THE EVENING RUSH WITH A CLOSURE OF OVER 4 HOURS.

### MOBILITY SNAPSHOT



#### **FREEWAY MOBILITY**

DECLINED THROUGHOUT THE REGION



#### **ARTERIAL MOBILITY**

JAN 2013 → 1.70 MIN/MILE AVG.

JAN 2014 → 1.71 MIN/MILE AVG.



#### **MAJOR INCIDENTS**

DEC 2013: 5 → JAN 2014: 8

2013 AVG. → 5.4 2013 AVG. → 8.0



#### **AVERAGE INCIDENT DURATION DEC → JAN**

LANE CLEARANCE 29:24 → 28:52

INCIDENT CLEARANCE 33:07 → 29:35

(MIN: SEC)



#### **MAJOR IMPACT WORK ZONES**

DEC 1 → JAN: 0

#### **MODERATE IMPACT WORK ZONES**

DEC 1 → JAN 0



#### **YEAR TO YEAR MOBILITY COMPARISON:**

JAN 2013 → JAN 2014

MAJOR IMPACT WZ:

IMPROVED

MODERATE IMPACT WZ:

IMPROVED

MAJOR INCIDENTS:

IMPROVED

ARTERIAL MOBILITY

DECLINED

FREEWAY MOBILITY:

IMPROVED

TRENDING

UP

### ZONING IN

#### **TMS WORK ZONES:**

◆ JAN 2013: 227

◆ JAN 2014: 169

#### **WORK ZONE BREAKDOWN:**

◆ MINOR: 144 - 100%

◆ MODERATE: 0 - 0%

◆ MAJOR: 0 - 0%

**WORK ZONE CRASHES: 2**





# WORK ZONES

TMC Observed Work Zones January 2014	
Level of Travel Time Impact	Number of Work Zones
Major Impact	0
Moderate Impact	0
Minor Impact	144
<b>Total</b>	<b>144</b>

\*Impact Levels described in Data Key

**SL District Inspections:**

- ◆ Dec 2013: 59%
- ◆ Jan 2014: 37%
- ◆ Goal: 50%

**SL Mobility Rating:**

- ◆ Dec 2013: 99%
- ◆ Jan 2014: 96%
- ◆ Goal: 91%

**Visibility levels:**

- ◆ Dec 2013: 96%
- ◆ Jan 2014: 93%
- ◆ Goal: 91%

**Major Impact (15 Minutes or Above Additional Travel Time)**

\*\*\*Zero Impacts\*\*\*

**Moderate Impact (10-14 Minutes Additional Travel Time)**

\*\*\*Zero Impacts\*\*\*

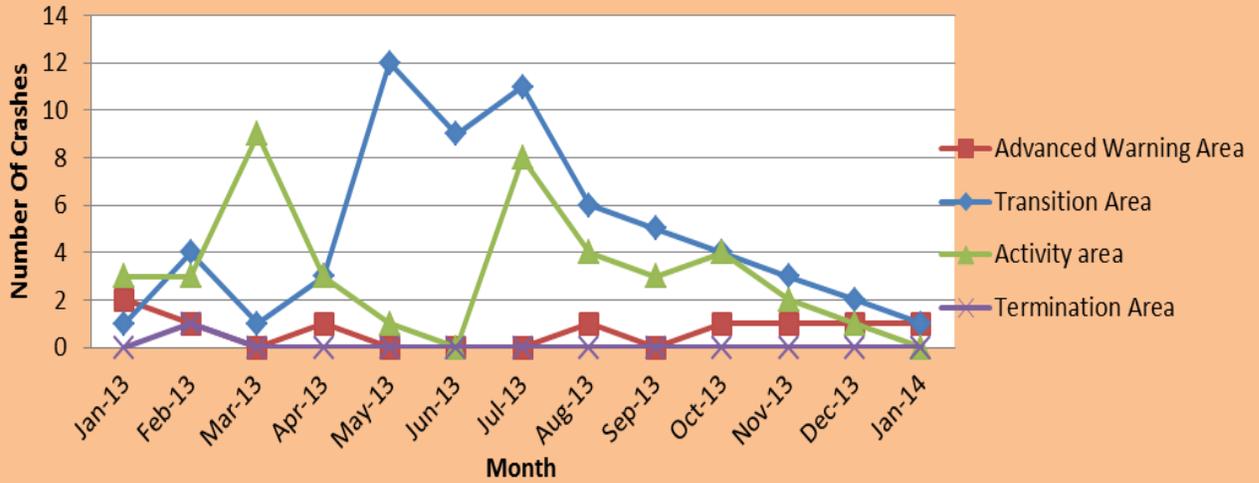
**Work Zone Related Crashes With Mobility Impact**

\*\*\*Zero Impacts\*\*\*

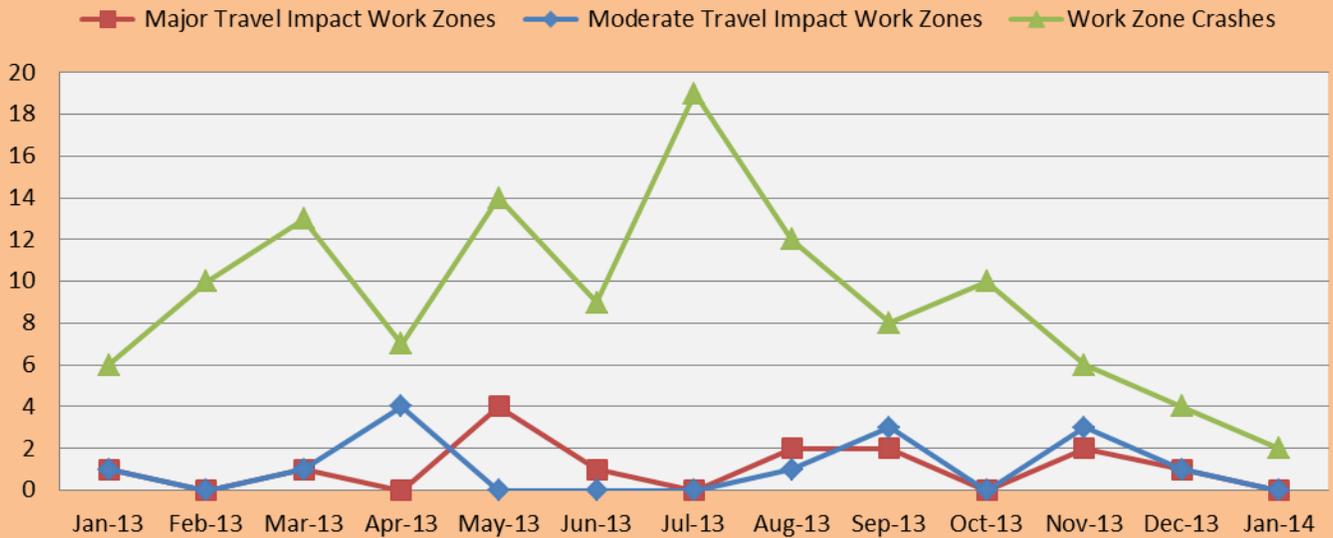


# WORK ZONES

## YTD Work Zone Crashes Relative to Work Zone

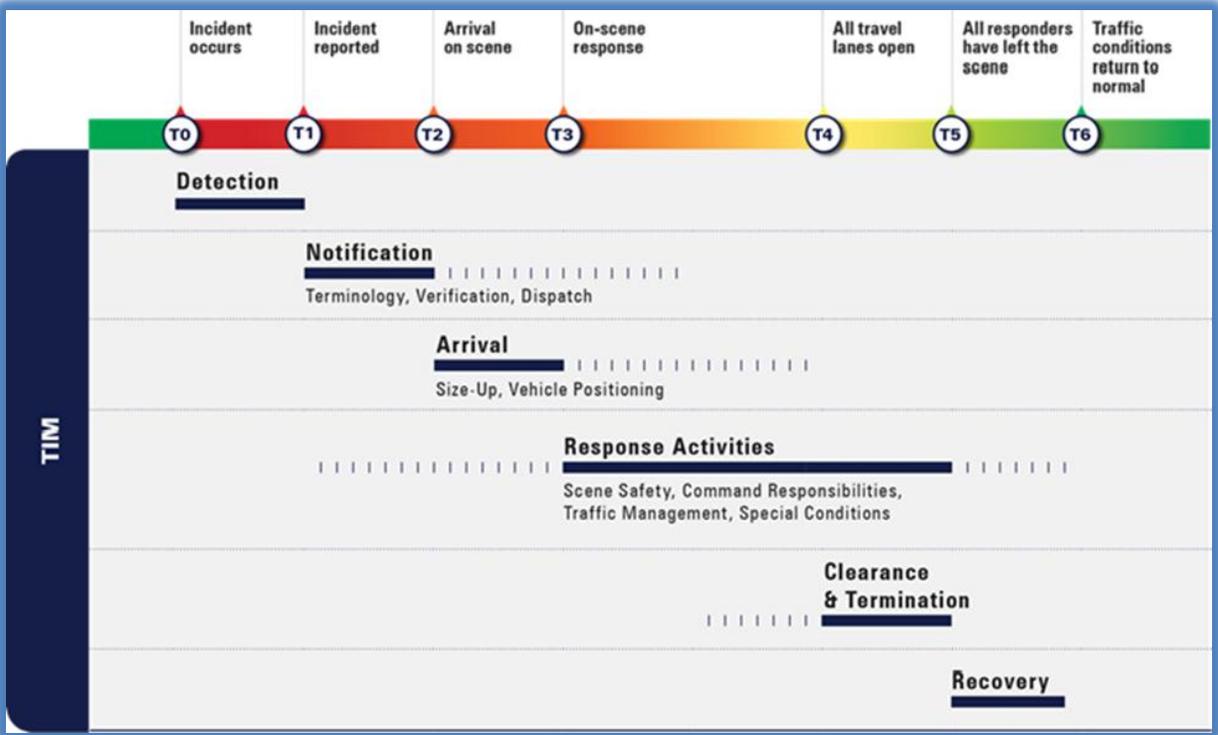
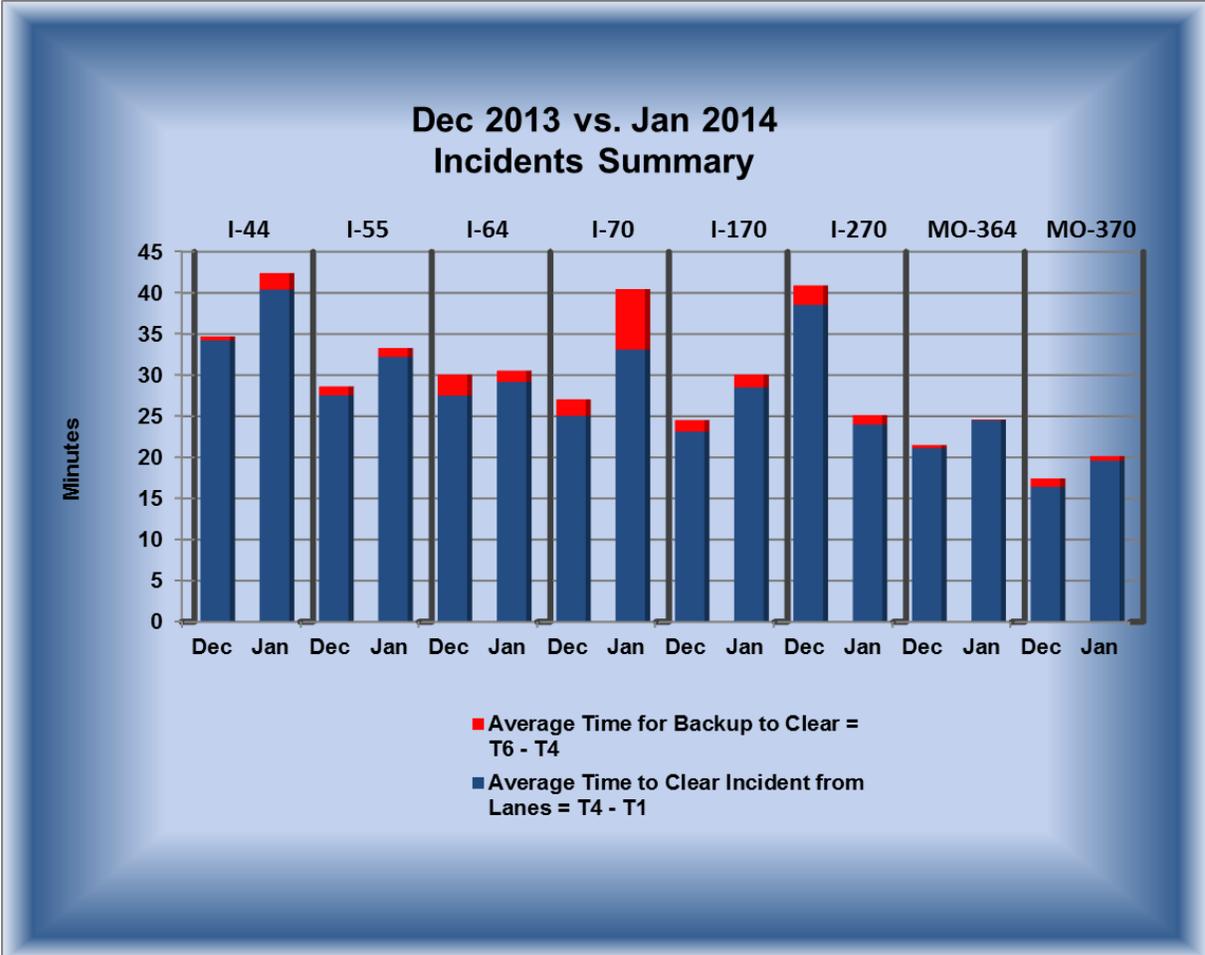


## YTD Work Zone History

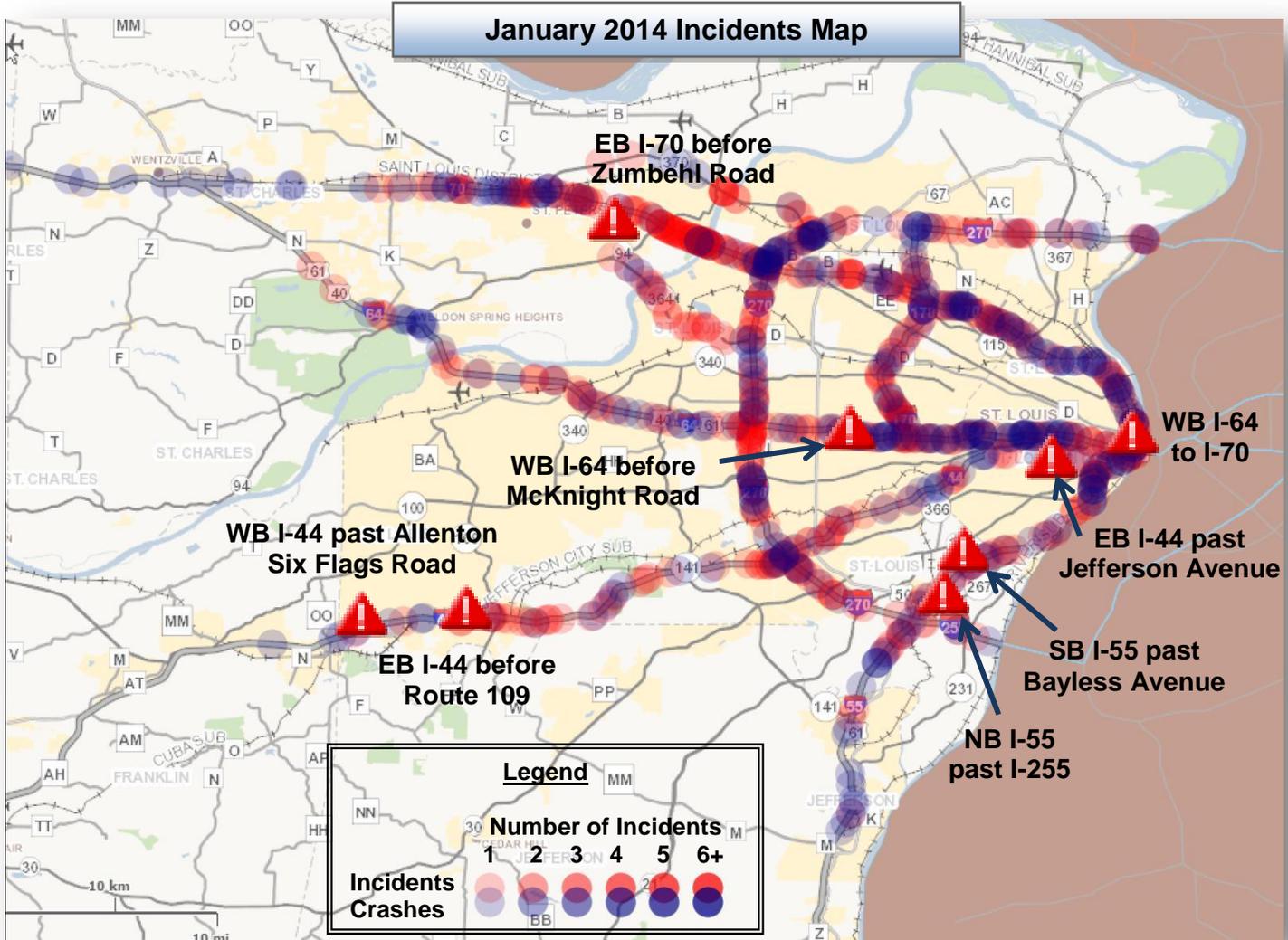




# INCIDENT MANAGEMENT



# INCIDENT MANAGEMENT



 Denotes Location of Major Impact Traffic Incidents

Number of Incidents			
	November	December	January
Interstate			
I-70	187	177	243
I-64	117	117	156
I-270	154	129	156
I-44	61	60	93
I-55	69	71	86
I-170	31	29	47
Mo-370	9	14	22
Mo-364	16	14	21
Total	644	611	824

**Number of Major Impact Incidents**  
December 2013 vs. January 2014  
(5) (8)

**Number of Fatal Incidents**  
December 2013 vs. January 2014  
(3) (2)

**Number of Tractor Trailer Incidents**  
December 2013 vs. January 2014  
(47) (78)

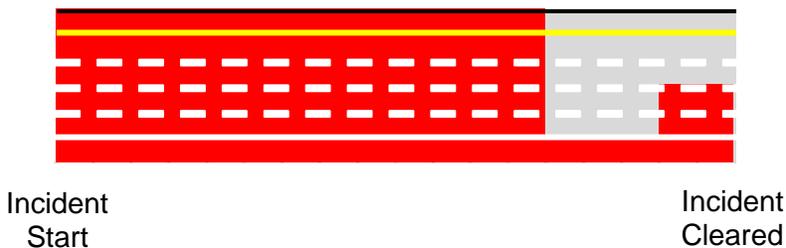
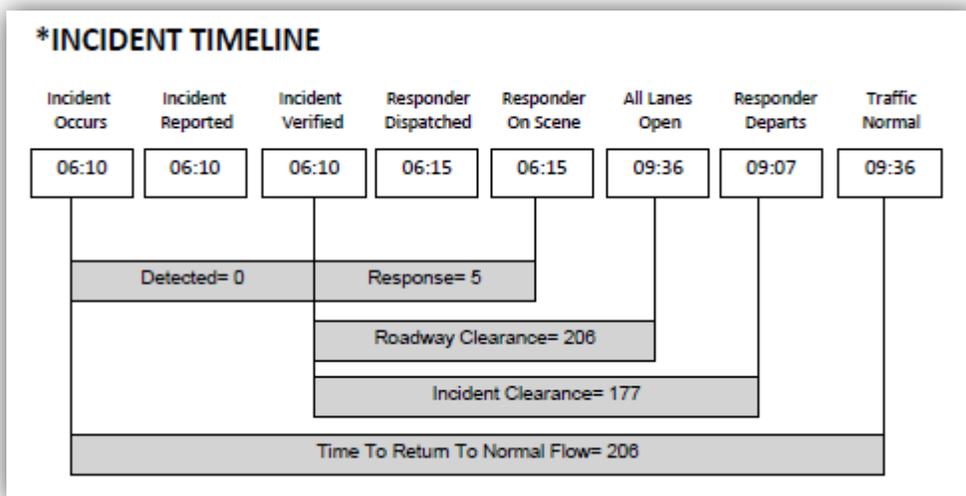


# INCIDENT MANAGEMENT

## Major Impact Traffic Incidents and Mitigation

1/2/2014 (Thursday)

- **Time:** 6:10 am – 9:36 am
- **Location:** St. Louis County – Eastbound I-44 before Route 109
- **Event:** A Multi-vehicle crash involving two cars and a Jackknifed Tractor Trailer
- **Action:** Transportation Management Center posted web-based and text message alerts, displayed advanced messaging on roadside message boards informing motorists of the lane closures and to use an alternate route. MoDOT Emergency Responders, Incident Management Coordinator and Maintenance, Eureka Fire and EMS, and a tow responded.
- **Estimated Initial Impact:** All lanes closed at 6:11 am.
- **Result:** Lane 1, 2, and the left shoulder were closed at 6:11am and opened at 8:16 am for a total of 2 hours and 5 minutes. Lanes 3, 4 and the right shoulder were closed at 6:10 am, opened at 8:17 am to relieve the queue and closed again at 8:49 am. All lanes were reopened at 9:07 am for a total closure of 2 hours and 25 minutes. Incident responders were delayed getting to the scene due to tractor trailer positioning. Responders were forced to come down Route 109 and then down the interstate in the opposite direction. Traffic queued for 4 miles during this event.
- **Event Duration:** 3 hours 26 minutes



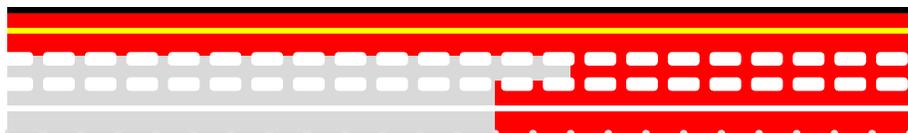
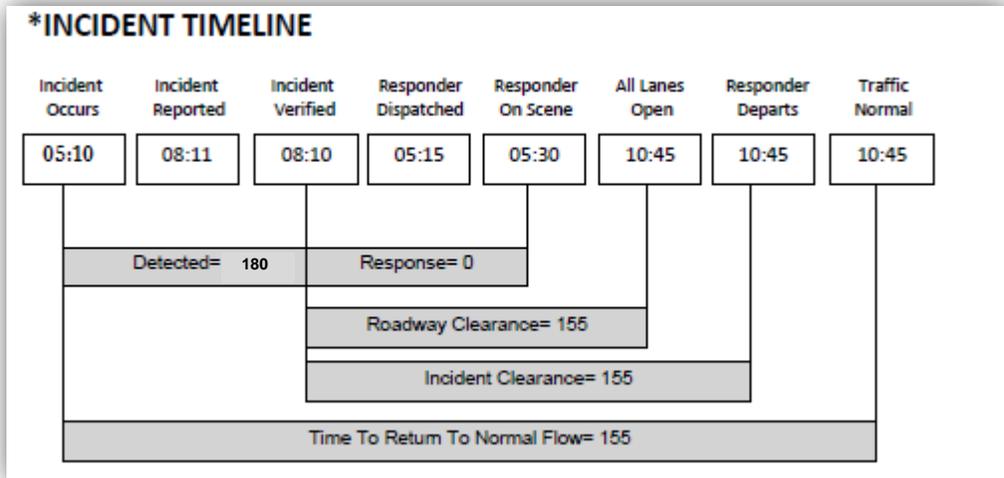


# INCIDENT MANAGEMENT

## Major Impact Traffic Incidents and Mitigation

1/4/2014 (Saturday)

- **Time:** 5:10 am – 10:45 am \*\*\*Fatal\*\*\*
- **Location:** Franklin County – Westbound I-44 past Allenton Six Flags Road
- **Event:** A multi-vehicle crash involving three vehicles resulting in a fatality
- **Action:** Transportation Management Center posted web-based and text message alerts, displayed advanced messaging on roadside message boards informing motorists of the lane closures. MoDOT Emergency Responders, MSHP, Accident Reconstruction Team, Meramec Fire and Ambulance, and Hyndrich Towing responded.
- **Estimated Initial Impact:** Three vehicle crash blocking lane 2 with one vehicle on fire.
- **Result:** A three vehicle crash occurred around 5:00 am and was not reported to the TMC until 8:10 am. At 8:10 am the left shoulder and lane 1 were closed. Lane 3 and the right shoulder were closed at 8:24 am with lane 2 closed at 8:52 am. All three lanes and shoulder were opened and closed until reconstruction was complete and event terminated. Complete lane closure times cannot be determined from start of event. All lanes opened and incident terminated at 10:45 am
- **Lessons Learned:** Demonstrates the importance of good communication between response agencies and the TMC to provide the necessary traffic control and mitigation for the most effective incident management.
- **Event Duration:** 5 hours 35 minutes



Incident Start

TMC Notified

Incident Cleared

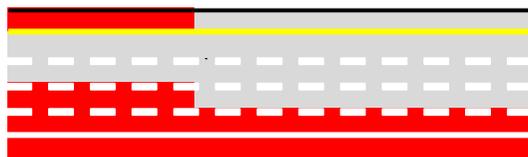
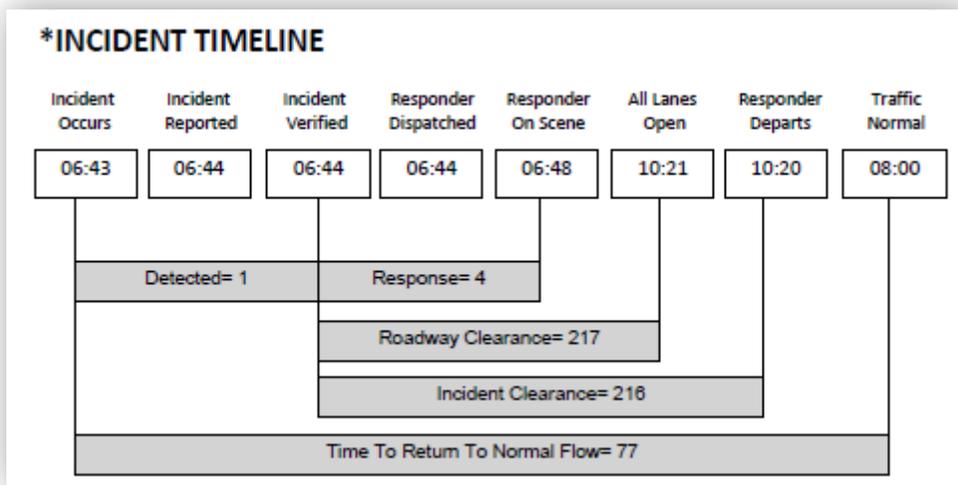


# INCIDENT MANAGEMENT

## Major Impact Traffic Incidents and Mitigation

1/5/2014 (Sunday)

- **Time:** 6:43 am – 10:21 am
- **Location:** St. Louis County – Northbound I-55 past I-255
- **Event:** A car struck a MoDOT Plow Truck
- **Action:** Transportation Management Center posted web-based and text message alerts, displayed advanced messaging on roadside message boards informing motorists of the lane closures. MoDOT Emergency Responders, St. Louis County Police, MSHP, and tow responded.
- **Estimated Initial Impact:** The crash closed the left shoulder and lanes 3 and 4.
- **Result:** The northbound left shoulder, lanes 3 and 4 closed at 6:44 am. The left shoulder and lane 3 opened at 7:59 am for a total closure time of 1 hour and 15 minutes. Lane 4 opened 10:21 am for a total closure of 3 hours and 38 minutes. The MoDOT Plow Truck's rear axle was busted during the crash and had to be towed from the scene.
- **Lesson Learned:** The tow truck that arrived on scene was not a heavy duty type and delayed removal of the plow. Requesting the proper tow vehicle for the right vehicle or equipment to be towed is paramount to quick safe clearance and needs to be communicated clearly at the start of the incident response.
- **Event Duration:** 3 hours 38 minutes



Incident Start

Incident Cleared

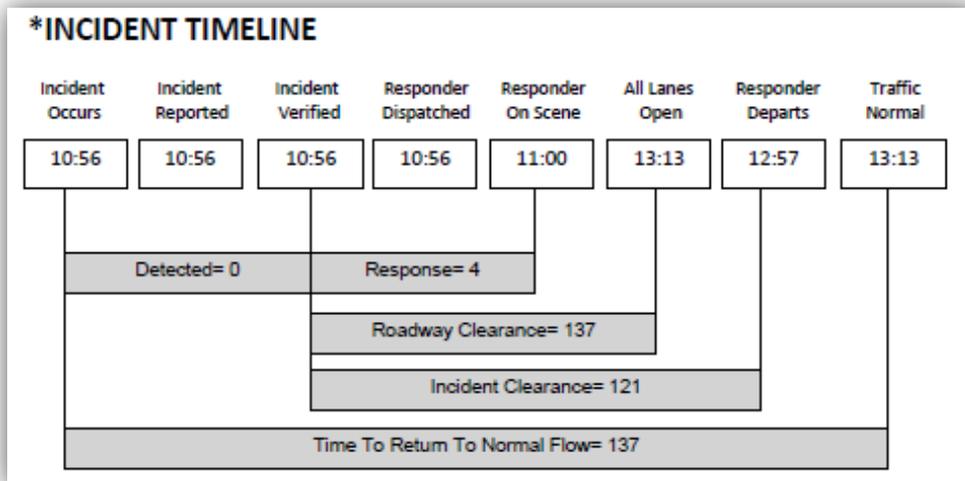


# INCIDENT MANAGEMENT

## Major Impact Traffic Incidents and Mitigation

1/6/2014 (Monday)

- **Time:** 10:56 pm – 1:13 pm **\*\*\*Fatal\*\*\***
- **Location:** St. Louis City – Eastbound I-44 past Jefferson Avenue
- **Event:** Two vehicle crash involving a Tractor Trailer and a car resulting in a fatality
- **Action:** Transportation Management Center posted web-based and text message alerts, displayed advanced messaging on roadside message boards informing motorists of the lane closures and to use an alternate route. MoDOT Emergency Responders and Maintenance, St. Louis City Fire and Police, Accident Reconstruction, the Coroner and a Tow responded.
- **Estimated Initial:** Total closure of all eastbound lanes and the exit to Jefferson Avenue
- **Result** All lanes were closed for 2 hours 16 minutes. Traffic exited at Grand Avenue with queues to Kingshighway. Clearance was delayed while waiting for the coroner to arrive on scene. Accident reconstruction took place and maintenance responded to the scene to retreat roadways before all lanes were reopened.
- **Lessons Learned:** The TMC was unable to get a good visual on the scene due to frost on cameras. Responder information was not documented well in ATMS as a result.
- **Event Duration:** 2 hours 17 minutes





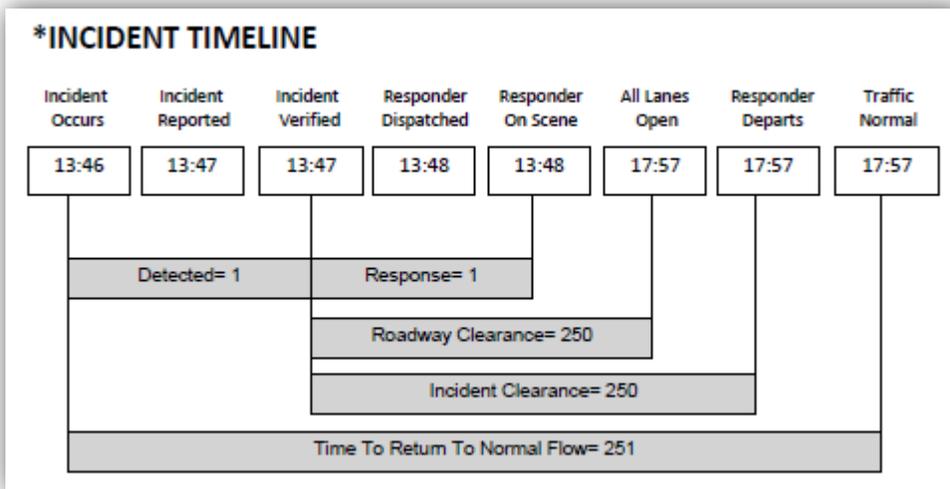


# INCIDENT MANAGEMENT

## Major Impact Traffic Incidents and Mitigation

1/13/2014 (Monday)

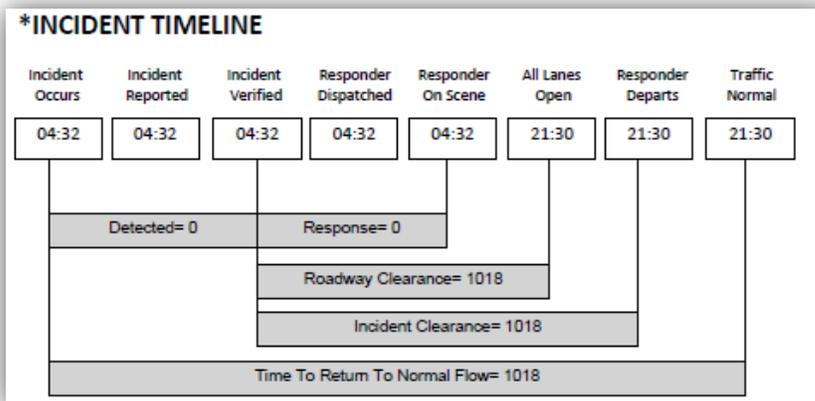
- **Time:** 1:46 pm – 5:57 pm
- **Location:** St. Louis City – Westbound I-64 to Westbound I-70
- **Event:** Overturned Tractor Trailer carrying steel coils spilled load onto ramp with cab hanging over guardrail above Westbound I-70
- **Action:** Transportation Management Center posted web-based and text message alerts, displayed advanced messaging on roadside message boards on I-44 and I-55 warning motorists of emergency vehicles on I-70 lane closure. MoDOT Emergency Responders and Maintenance, St. Louis City Police, Fire, and EMS, and City Towing responded. City Engineer, IDOT, Motor Carriers and EOC all notified.
- **Estimated Initial:** Ramp closed from Westbound I-64 to Westbound I-70 at 1:46 pm.
- **Result:** Westbound I-70 right shoulder and lane 2 closed at 2:24 pm. Lane 2 and the right shoulder were opened at 5:12 pm for a total closure of 2 hours and 48 minutes of Westbound I-70. Ramp from Westbound I-64 to Westbound I-70 opened at 5:57 pm for a total closure of 4 hours and 11 minutes. Load had to be removed with a crane before truck could be up-righted.
- **Event Duration:** 4 hours 11 minutes



## Major Impact Traffic Incidents and Mitigation

1/21/2014 (Tuesday)

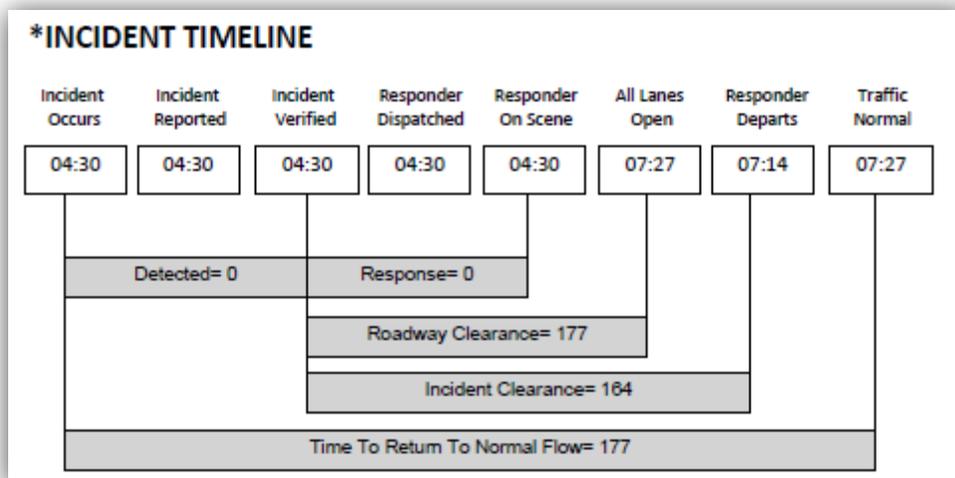
- **Time:** 4:32 am – 9:30 pm **\*\*\*Hazardous Spill\*\*\***
- **Location:** St. Louis County – Southbound I-55 at Bayless Avenue
- **Event:** A MoDOT Salt Spreader was clipped by a Gasoline Tanker rupturing the tanker's compartment tank and causing a gasoline spill of approximately 2100 gallons of gasoline
- **Action:** Transportation Management Center posted web-based and text message alerts, displayed advanced messaging on roadside message boards informing motorists of the lane closures. MoDOT Emergency Responders and Maintenance, St. Louis County Police and Fire, Department of Natural Resources, and Towing responded. Community Relations and EOC were notified.
- **Estimated Initial:** The right shoulder and Lane 4 closed at 4:32 am.
- **Result:** Lanes 1, 2, 3, and the left shoulder closed at 4:50 am for containment of the 2100 gallons and opened at 11:41 am for a total closure of 7 Hours and 9 minutes. Lane 4, which is the exit lane, remained closed until 9:26 pm for a total closure of 16 hours and 56 minutes. When the incident occurred traffic was diverted at Weber Road where there is no signal to modify. At 7:24 am Northbound I-55 was shut down in order for emergency crews to remove the vehicles involved in the incident off of the road. The signals at the Bayless ramps were set to "free" operation at 7:30 am for traffic that was exiting Northbound I-55 to divert from the closure. Traffic backed up near Lindbergh with adjusted timings in place. Northbound I-55 was reopened at 8:04 am. Signals at Bayless were left on free operation until 9:00 am. The right shoulder was cleared at 9:30 pm for the total closure of 16 hours and 58 minutes.
- **Lessons Learned:** Without a good alternate route/outer road to provide a diversion plan, placing the ramp signals on free operation was the most efficient way to allow traffic to exit the highway and navigate their own detour on county roads.
- The Motorist Assist truck's peat moss spreaders will need to be adapted to reach greater distances for bigger spills.
- **Event Duration:** 16 hours 58 minutes



## Major Impact Traffic Incidents and Mitigation

1/24/2014 (Friday)

- **Time:** 4:30 am – 7:27 am
- **Location:** St. Charles County – Eastbound I-70 before Zumbuhl Road
- **Event:** Two vehicle crash involving two tractor trailers with a 150 gallon fuel spill
- **Action:** Transportation Management Center posted web-based and text message alerts, displayed advanced messaging on roadside message boards informing motorists of the lane closures. MoDOT Emergency Responders, MSHP, St. Charles County Police, Central County Fire and EMS, St. Charles Fire, St. Charles County Hazmat Response Team and A1 Towing responded.
- **Estimated Initial:** Lane 3 closed at 4:30 am.
- **Result:** Driver of a tractor trailer struck the back of another truck blocking lane 3. Lane 2 closed at 4:38 am and remained closed until 7:27 am for a total closure of 2 hour and 36 minutes. Lane 3 remained closed until 7:27 am for a total closure of 2 hours and 57 minutes. Both lanes remained closed for fuel cleanup from saddle tank and debris removal. There was a 4 mile queue to Spencer Road at the onset of the event. A 10 minute queue at 7:00 am of two miles that caused additional travel time for approximately 3,168 cars and 3,804 motorists during the morning rush. Work crews returned around 1:00 pm to do additional cleanup, closing one lane, which resulted in additional traffic backups.
- **Event Duration:** 2 hours 57 minutes





# FREEWAY MANAGEMENT



## AM Peak Changes in January 2014

**A B C D** Mobility Declined

\*All weekdays are included in speed index calculation

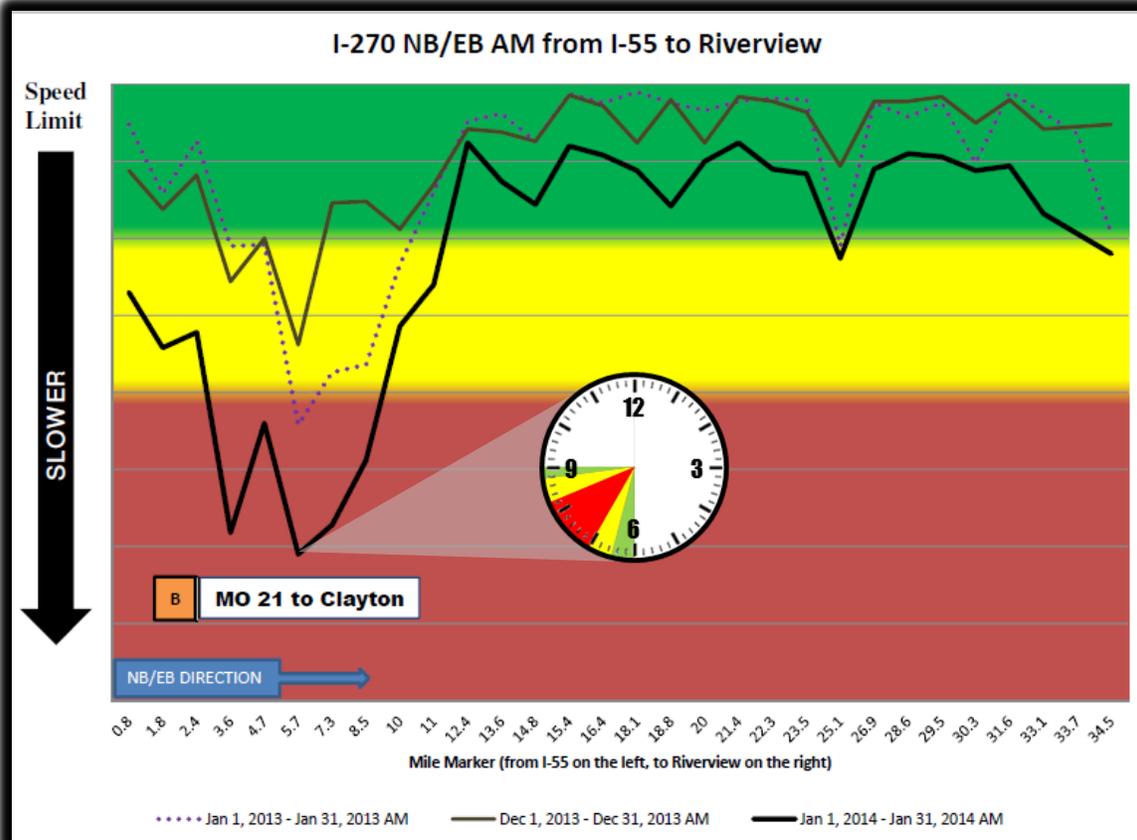
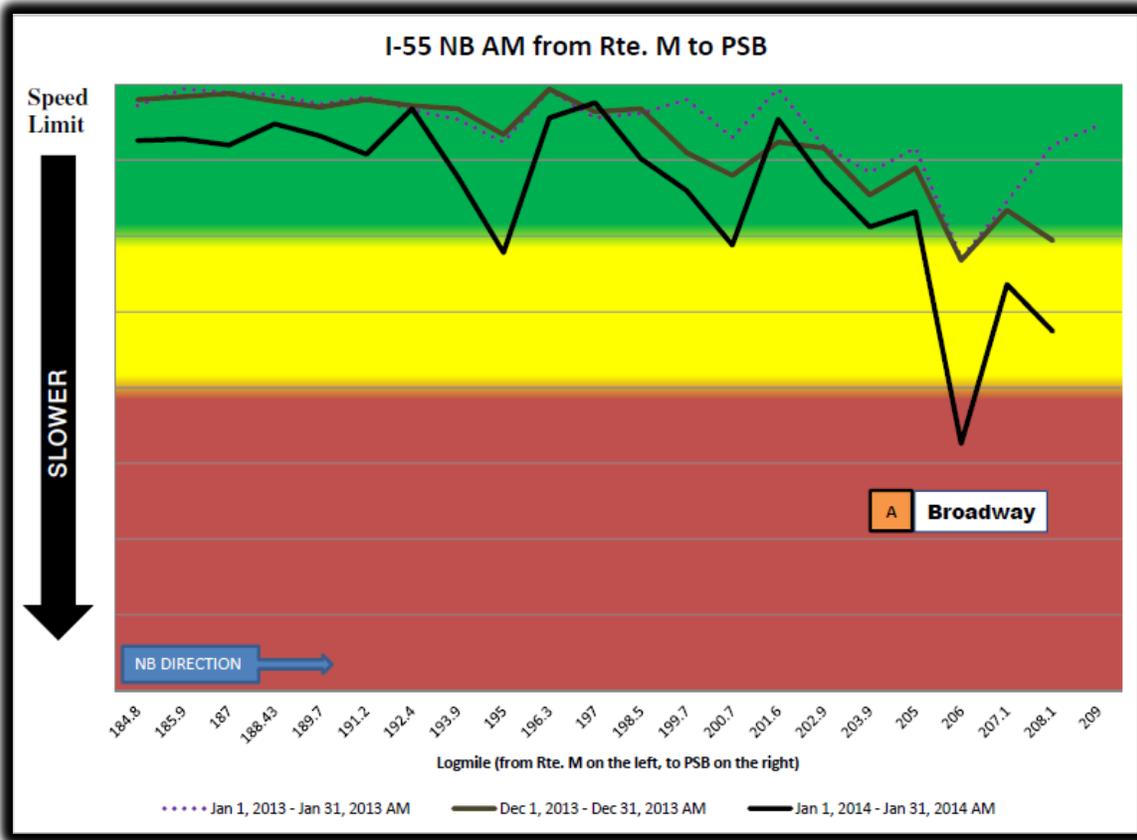


**Worst Time to Travel Clocks**

- The clocks found on the speed charts depict the progression of travel speeds during the commute peak period at the worst congestion location along the route.
- For example, the clock on the left depicts conditions worsening at a particular location beginning at 6:30 a.m. with the slowest speeds between 7 a.m. and 8:15 a.m. Conditions improved at 8:45 a.m.

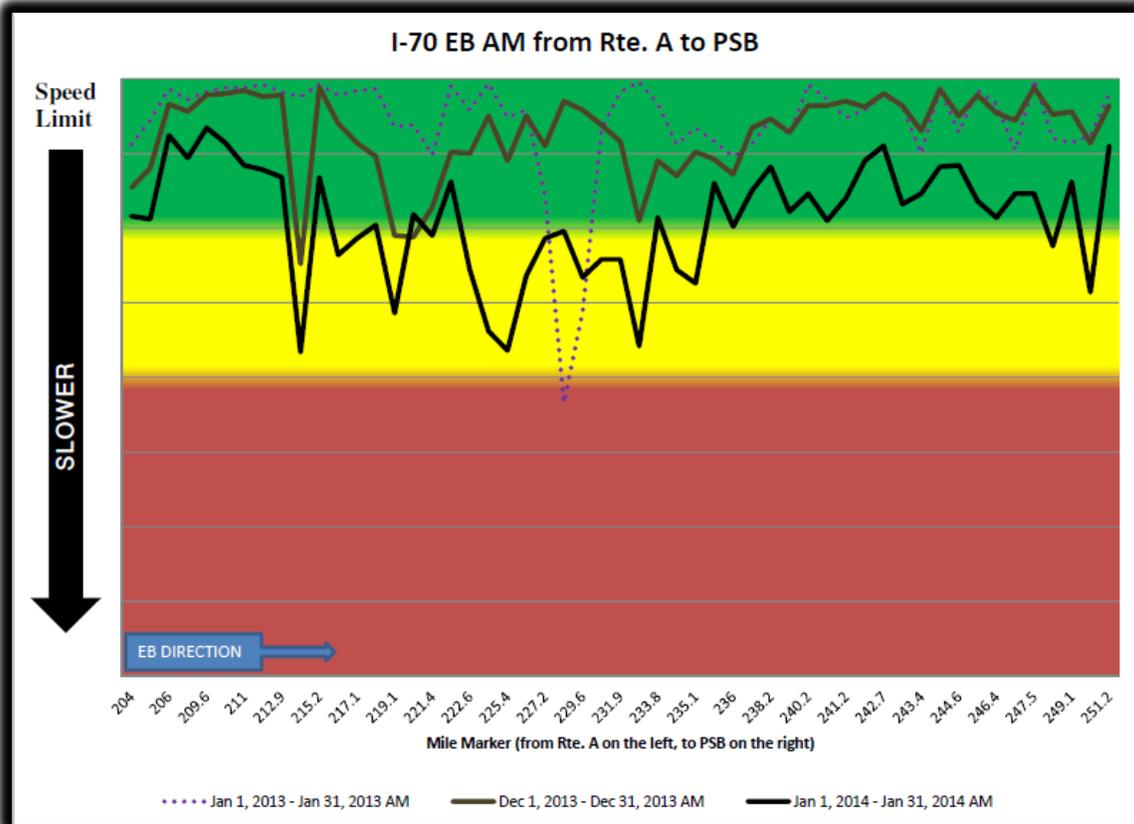
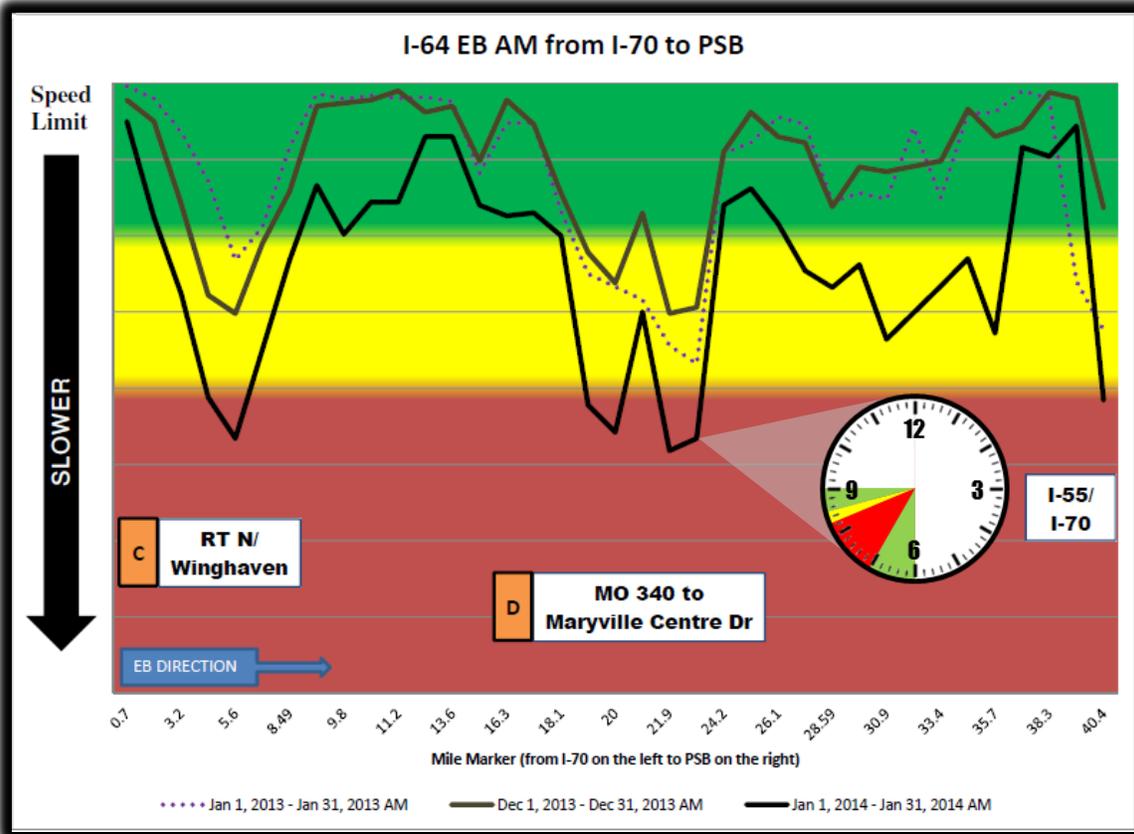


# FREEWAY MANAGEMENT





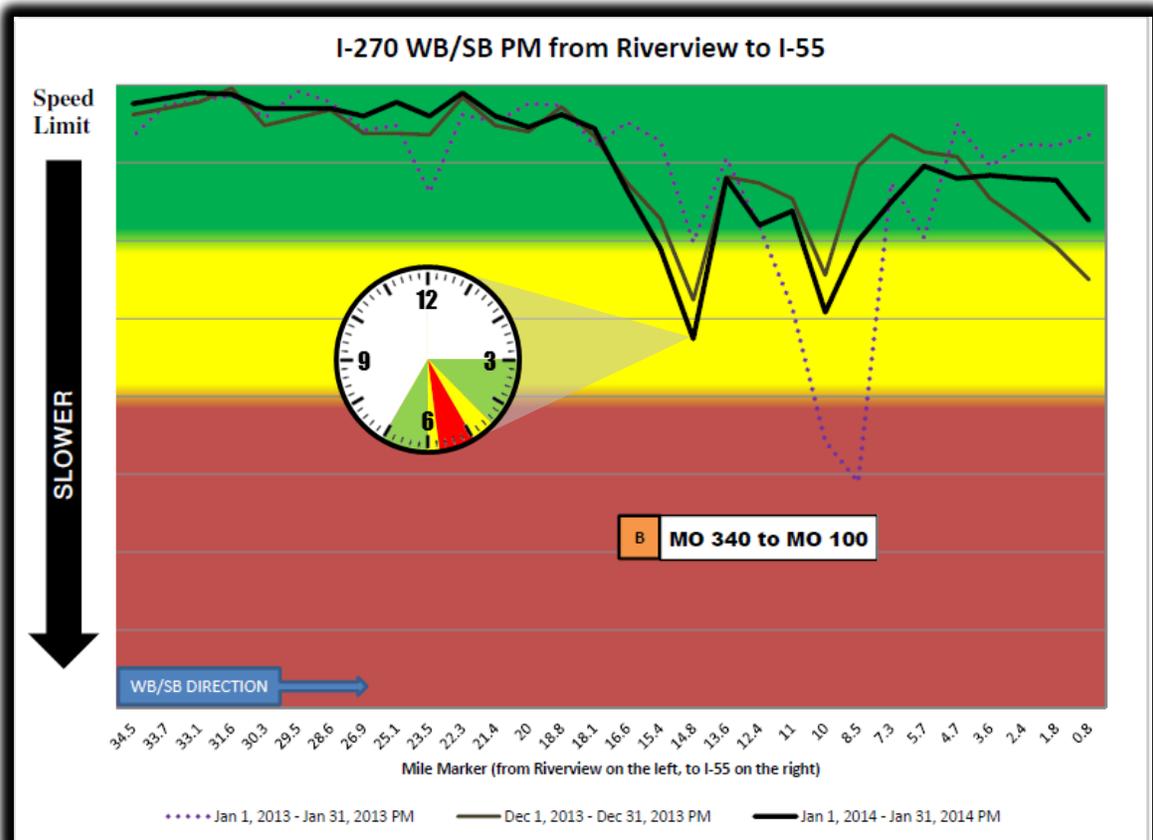
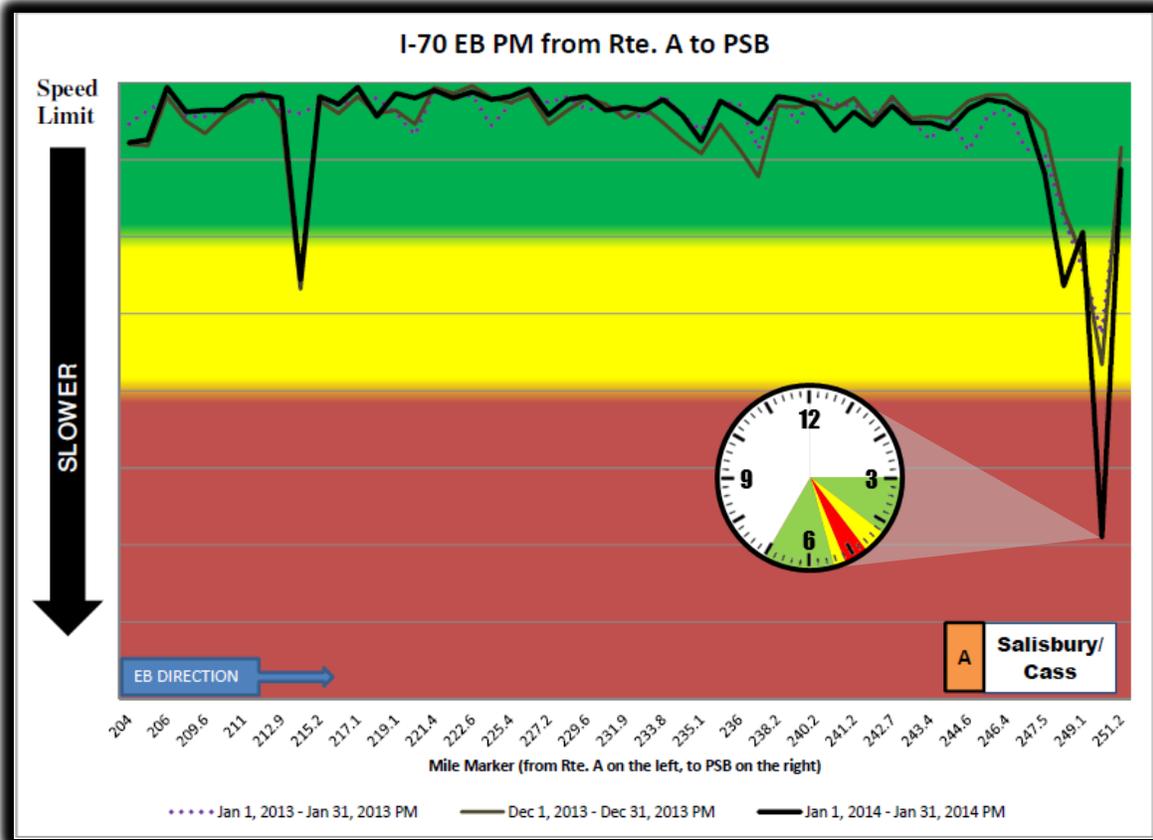
# FREEWAY MANAGEMENT







# FREEWAY MANAGEMENT



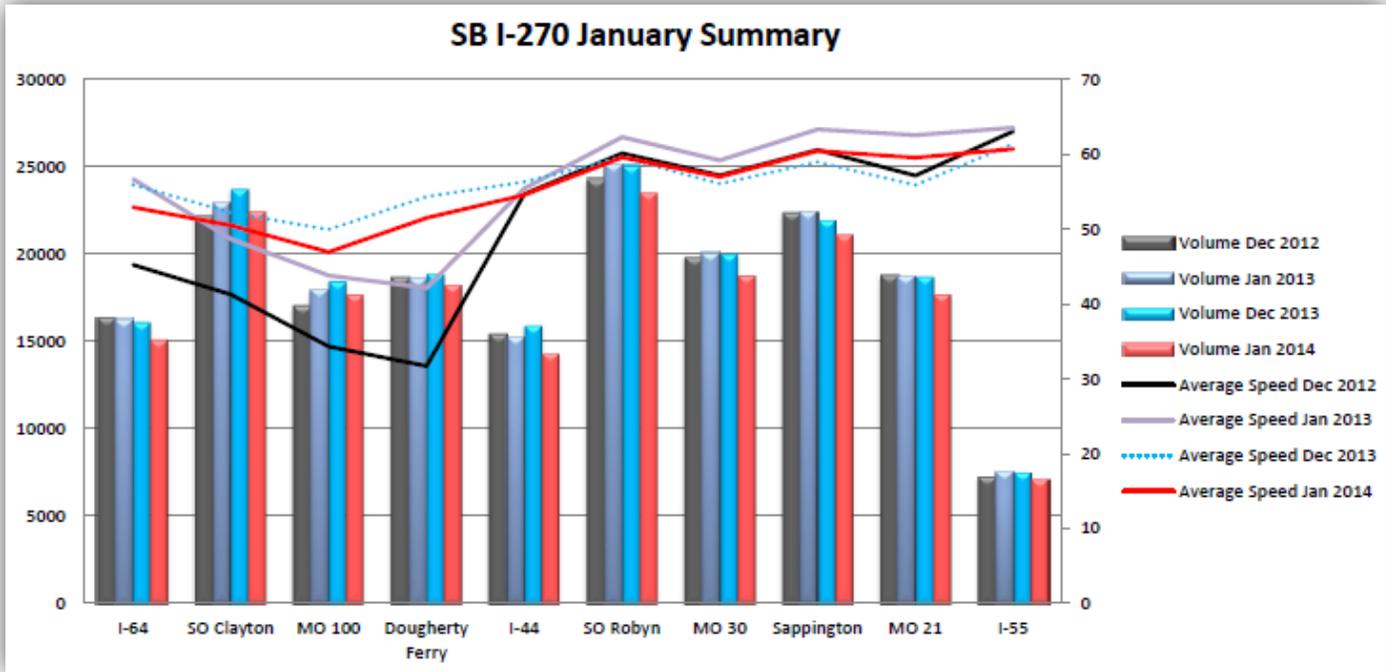


# FREEWAY MANAGEMENT

## Southbound I-270 Lane Addition

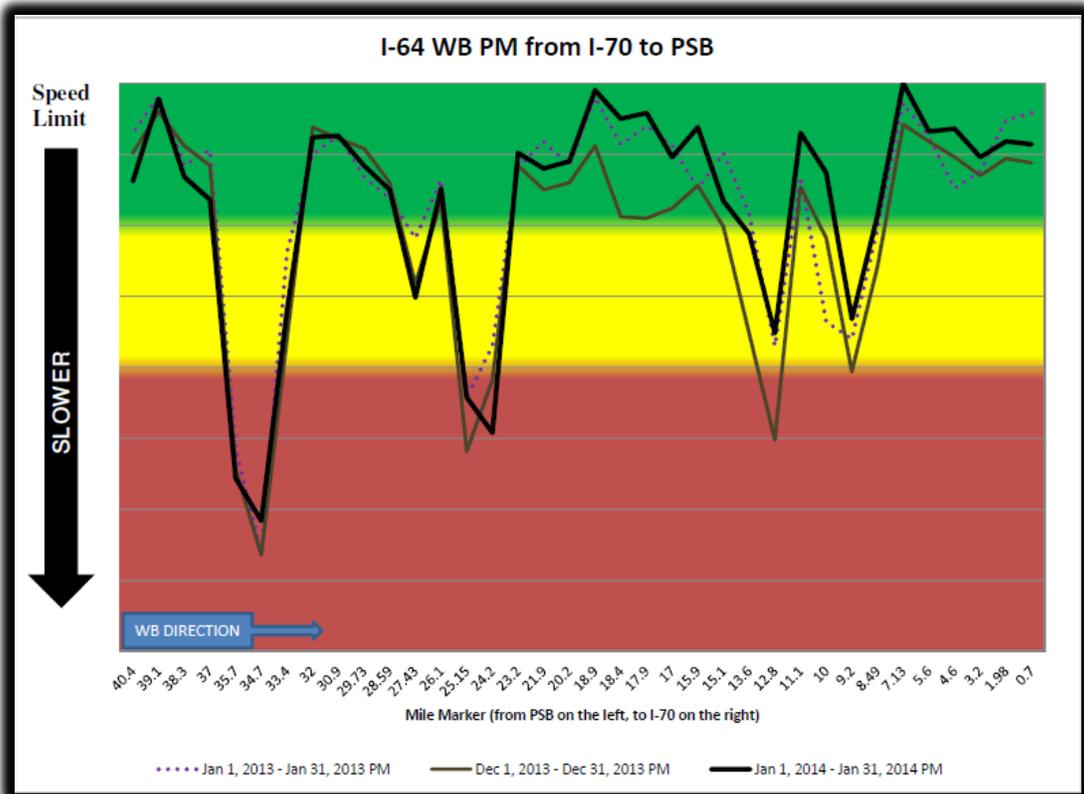
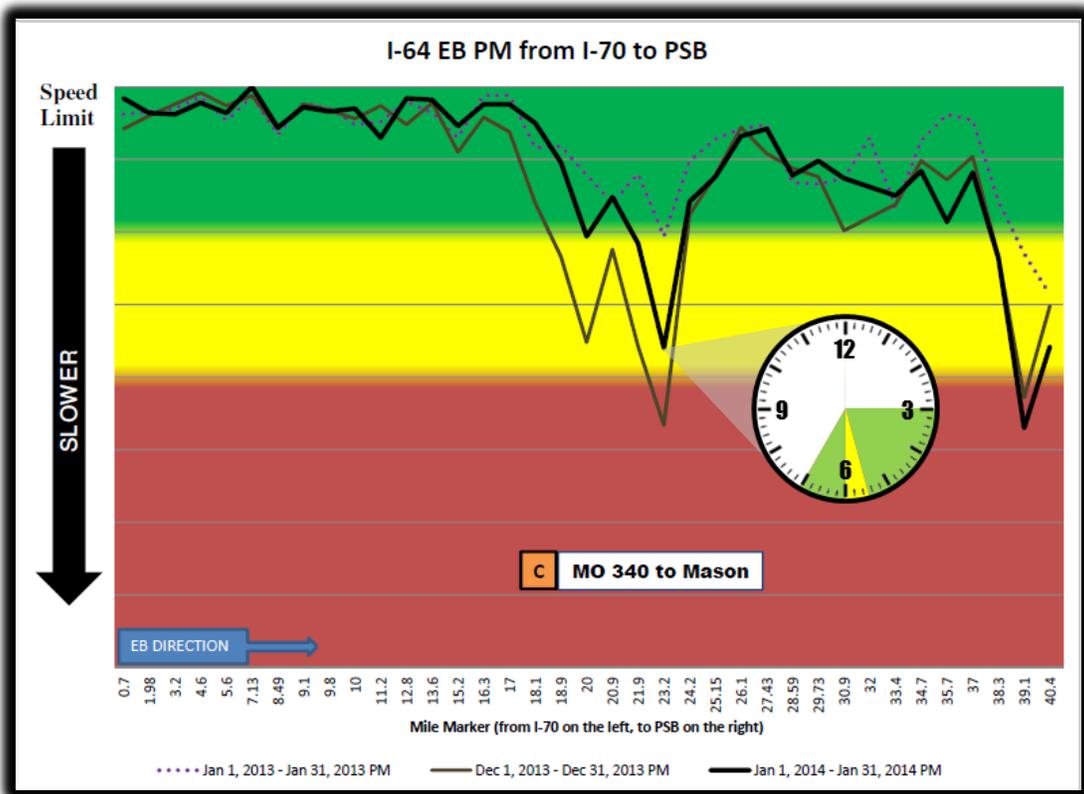
This is the fourth month of reporting on the Southbound lane addition on I-270 between Dougherty Ferry and I-44.

Volumes have remained lower when compared to January 2013. As a result, the speeds have increased at Dougherty Ferry and remained steady at I-44.



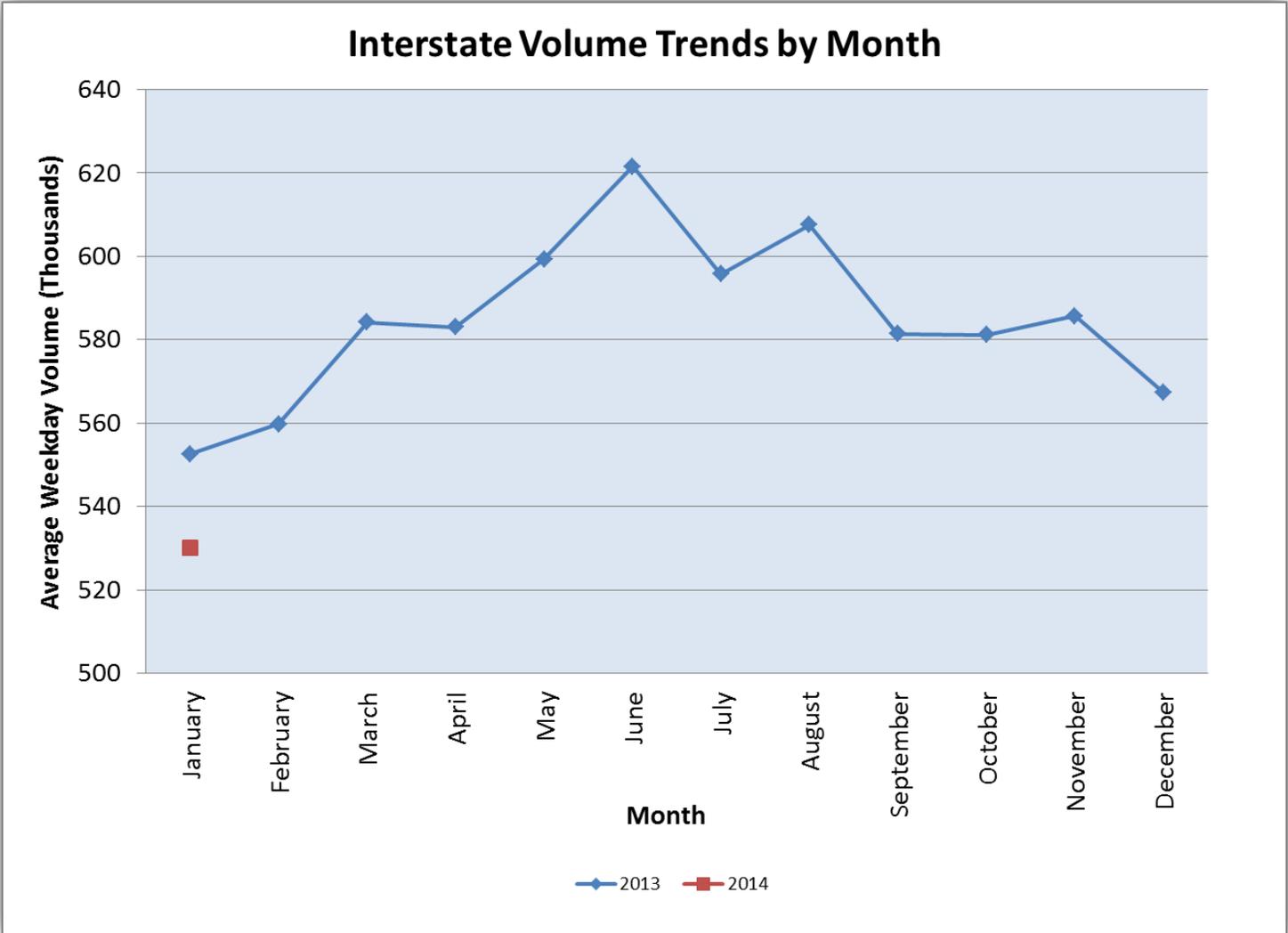


# FREEWAY MANAGEMENT





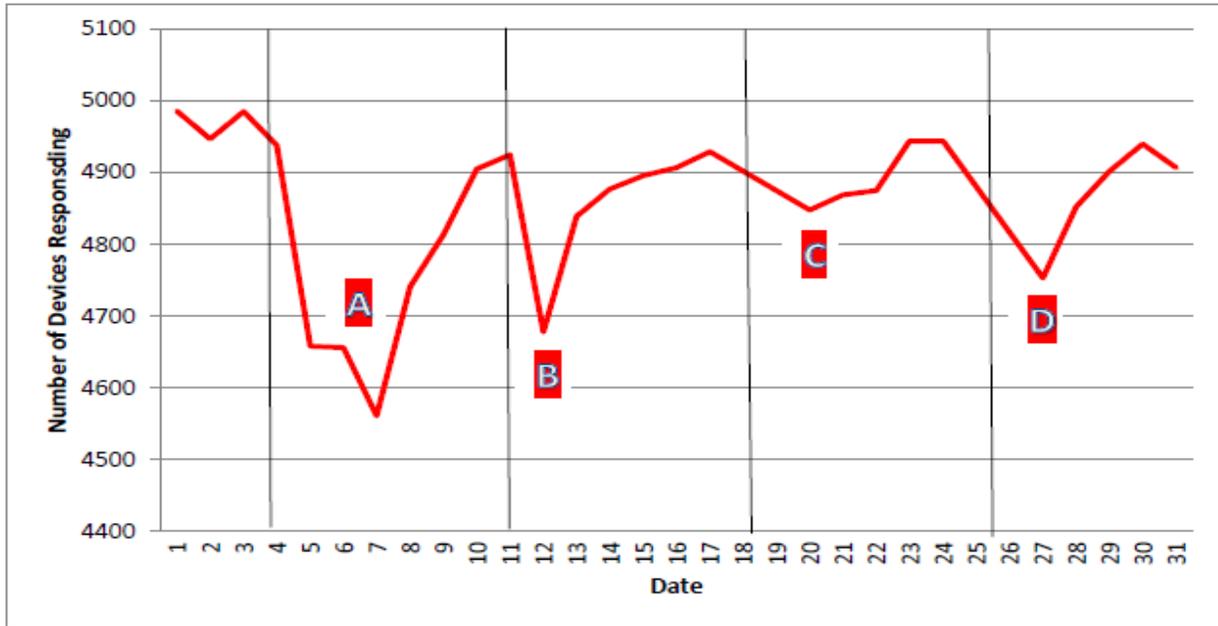
# FREEWAY MANAGEMENT



Readings from every detector on the interstates in the St. Louis District are used for this comparison. An average 24 hour volume value is determined for each route and direction per month. The average values are then combined for a total 24 hour volume. The values presented represent the number of vehicles on the district's interstates on the average weekday for each month.



## ITS Devices On Line



Efforts highlighted in this report such as data collection, incident management by the TMC, and DMS messaging all depend on a reliable communication network throughout the District in order to use CCTV cameras, data sensors, and DMS's.

Each workday, a scan of the network is undertaken in order to determine how many devices are communicating back to the TMC. The chart above and associated milestones show the trends of those scans and the effects certain events have on the "health" of the network and in turn the ability to utilize ITS devices.

**A January 5-11:** Snow event results in scattered power outages and field maintenance being reassigned to snow plow duty.

**B January 13:** Some secondary failures from week before plus routine issues with no field maintenance available until the 15<sup>th</sup>.

**C January 20:** Scattered electric outages resulted in need to reset several switches.

**D January 27:** Remote network outage affecting the rural connections.

## **Average Rate of Travel on Selected Signalized Routes by Calendar Year Average Travel Time per Mile Arterial Management**

The purpose of this measure is to determine how well selected arterials across the region are operating during the peak traffic times. As improvements are made, such as signal timing, equipment upgrades, or access management improvements, this measure will show the effects of those efforts and decisions on the arterial system.

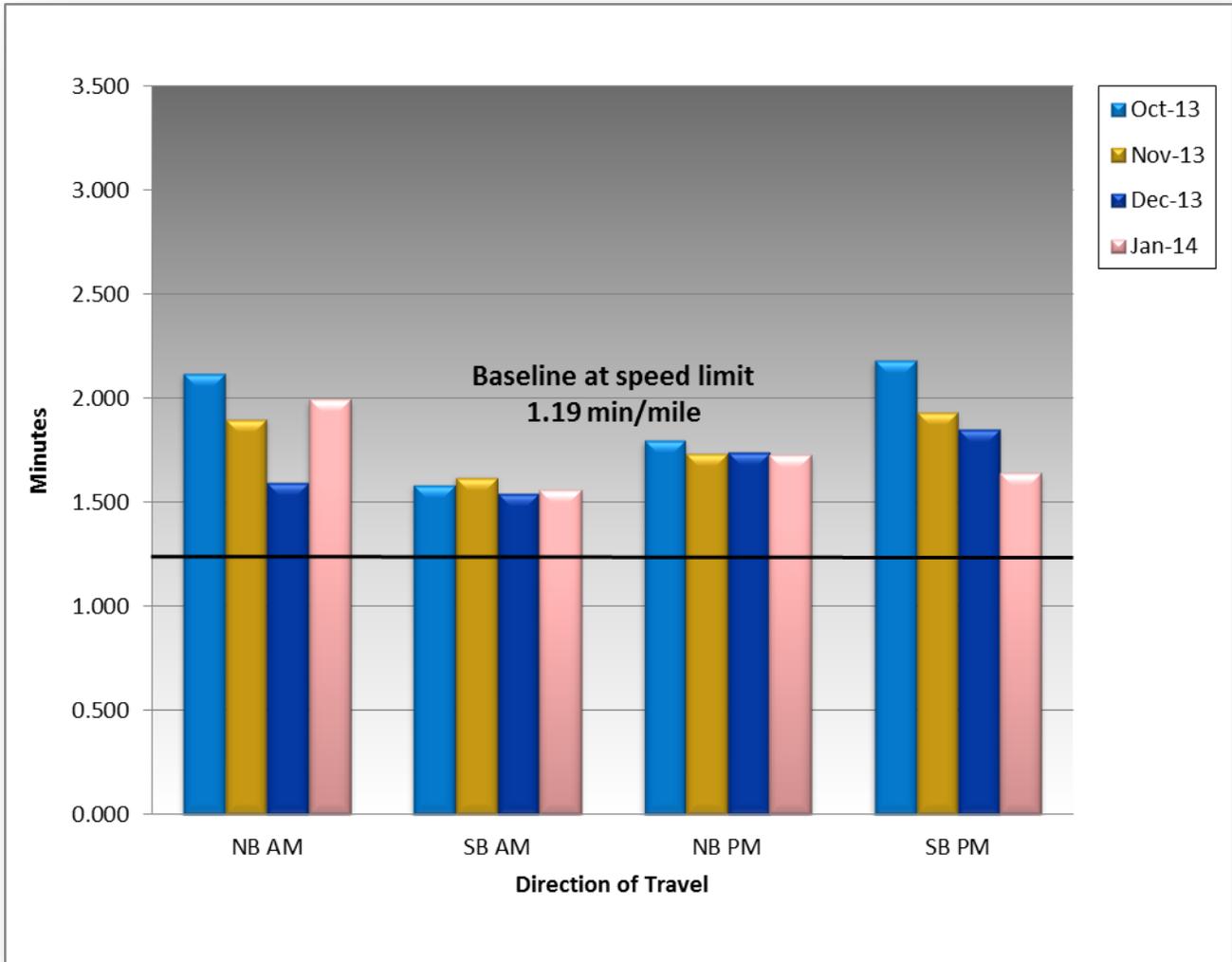
Travel times are measured on various arterial routes. For most routes, data is collected from driving each route multiple times during the A.M. and P.M. peak periods and timing how long it takes to traverse the route. For Rte. 141 and US 67, the Sensys Travel Time system is utilized to determine the travel times and allows a much more comprehensive collection of data. The travel time is compared to the speed limit and the average minutes per mile are calculated. An average minutes per mile based on a perfect run through the corridor is calculated and used as the baseline for comparison. If the actual average minutes per mile are at the baseline, traffic is moving at the speed limits without any stops.

The routes where data was collected include the following:

- Route 141\*, from I-55 to I-64
- Route 30, from Route PP to Weber Hill Road
- Route 100, from Route 340 to Maple Lane
- US 50, from Union West City Limit to Denmark
- US 67\*, from Route 367 to I-270

\* Routes where data was collected using Sensys system.

## Route 141, from I-55 to US 40 St. Louis and Jefferson Counties



Overall, traffic patterns are nearly the same as January 2013. NB AM travel times showing an increase and SB PM indicating a decline.

This corridor encompasses many systems and is currently under study for coordination updates in 2014.

Number of Signals - 41

Length of system - 18.6 miles

Speed Limit on this corridor varies from 45 mph to 55 mph

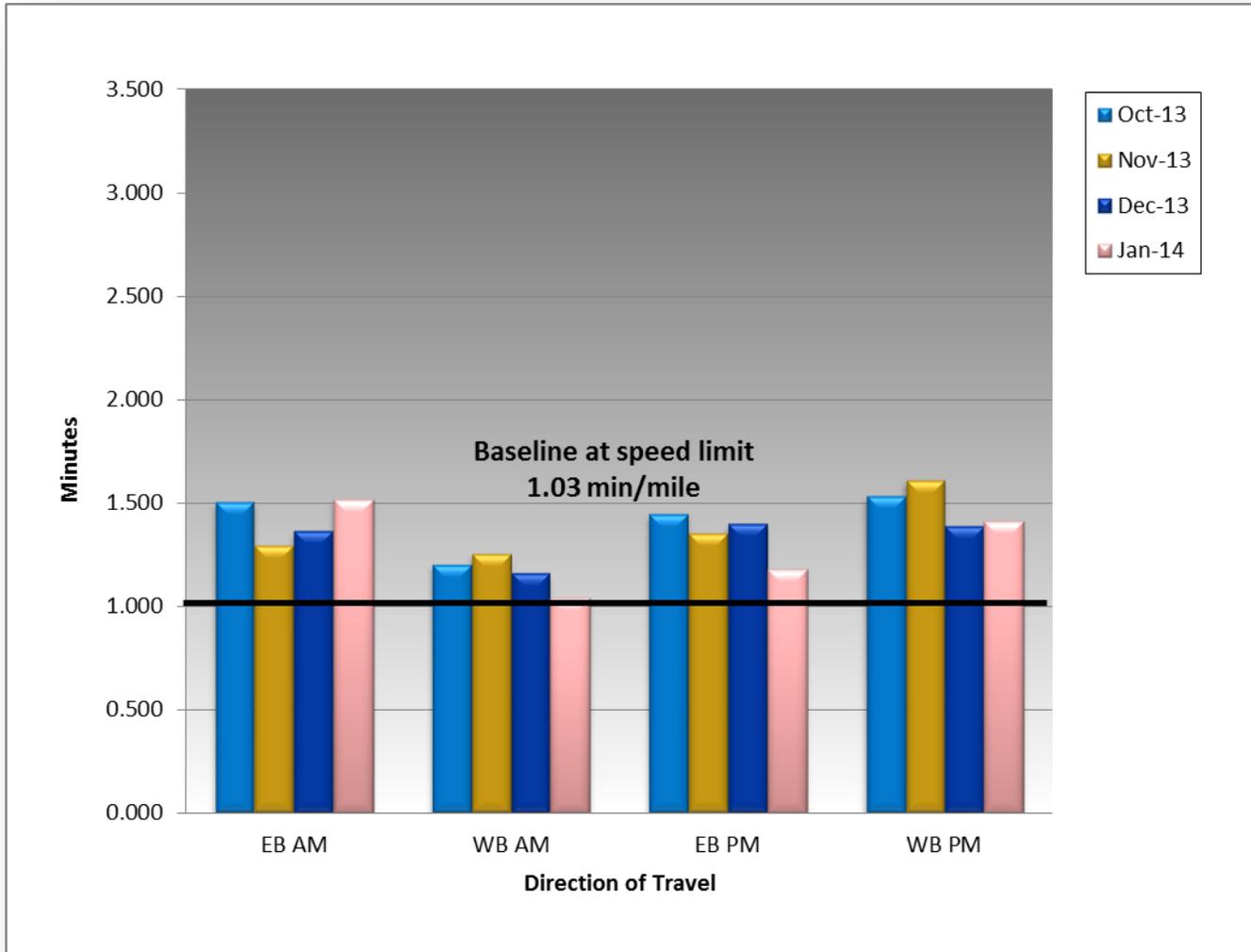
Number of Lanes – This is an urban/rural 4-6 lane expressway with signalized crossovers and several grade separated interchanges.

Weighted AADT for length of segment – 35930

AM and PM peak directions vary in segment and direction.

This system provides travel time data based on the Sensys Travel Time system.

## Route 30, from Route PP to Weber Hill Road St. Louis and Jefferson Counties



Traffic patterns showing changes for all directions except WB PM. Compared to January 2013, all are indicating higher travel times.

This system is scheduled for optimization this year.

Number of Signals - 11

Length of system - 9.2 miles

Speed Limit varies from 50 mph and 60 mph

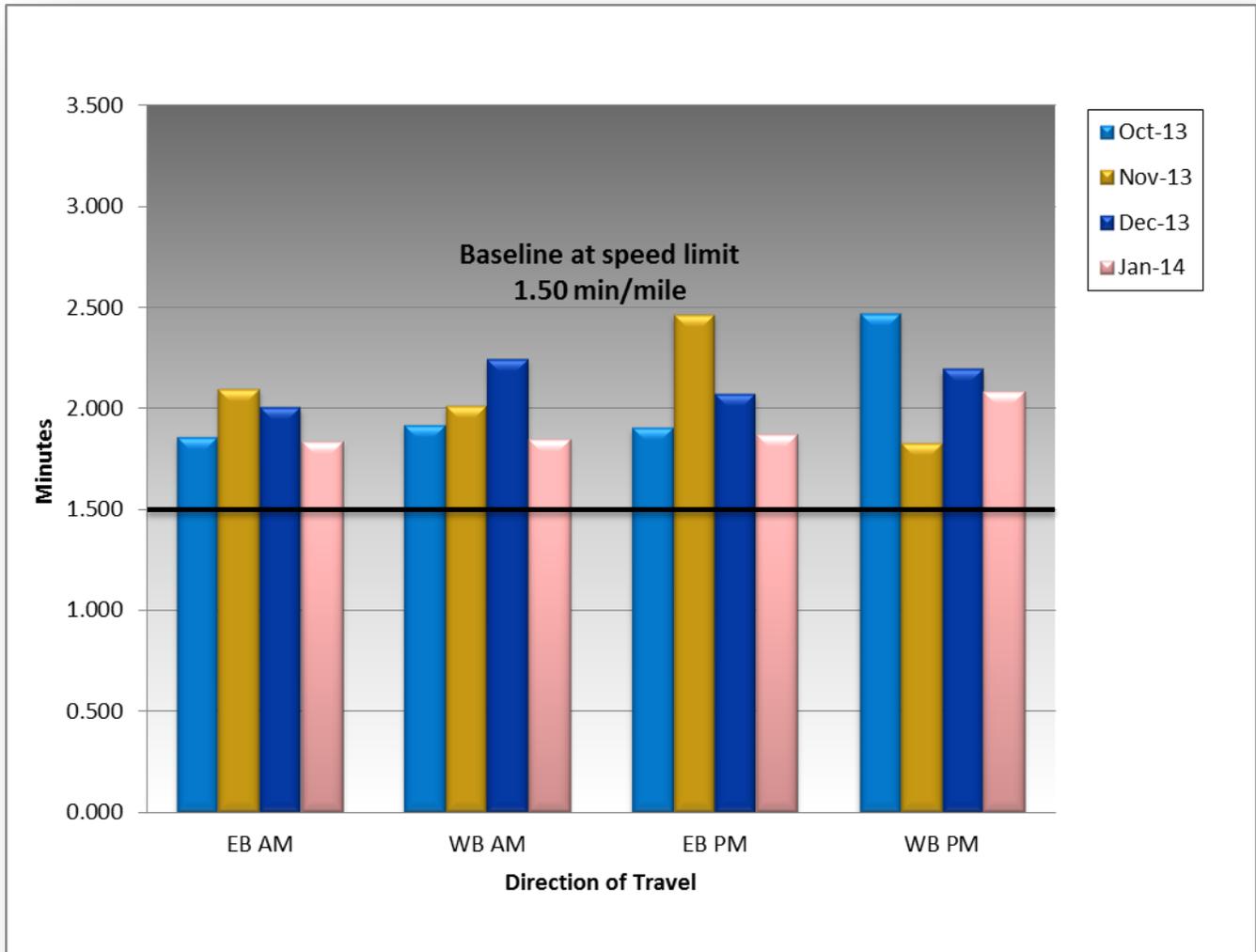
Number of Lanes - This is a rural four lane expressway with signalized crossovers

Weighted AADT for length of segment – 38150

AM peak flow is EB. PM peak direction is WB.

A portion of this system is currently under construction to install a Sensys Travel Time system (Weber Hill to Rte.141 ~ 3mi)

## Route 100, from Route 340 to Maple Lane St. Louis County



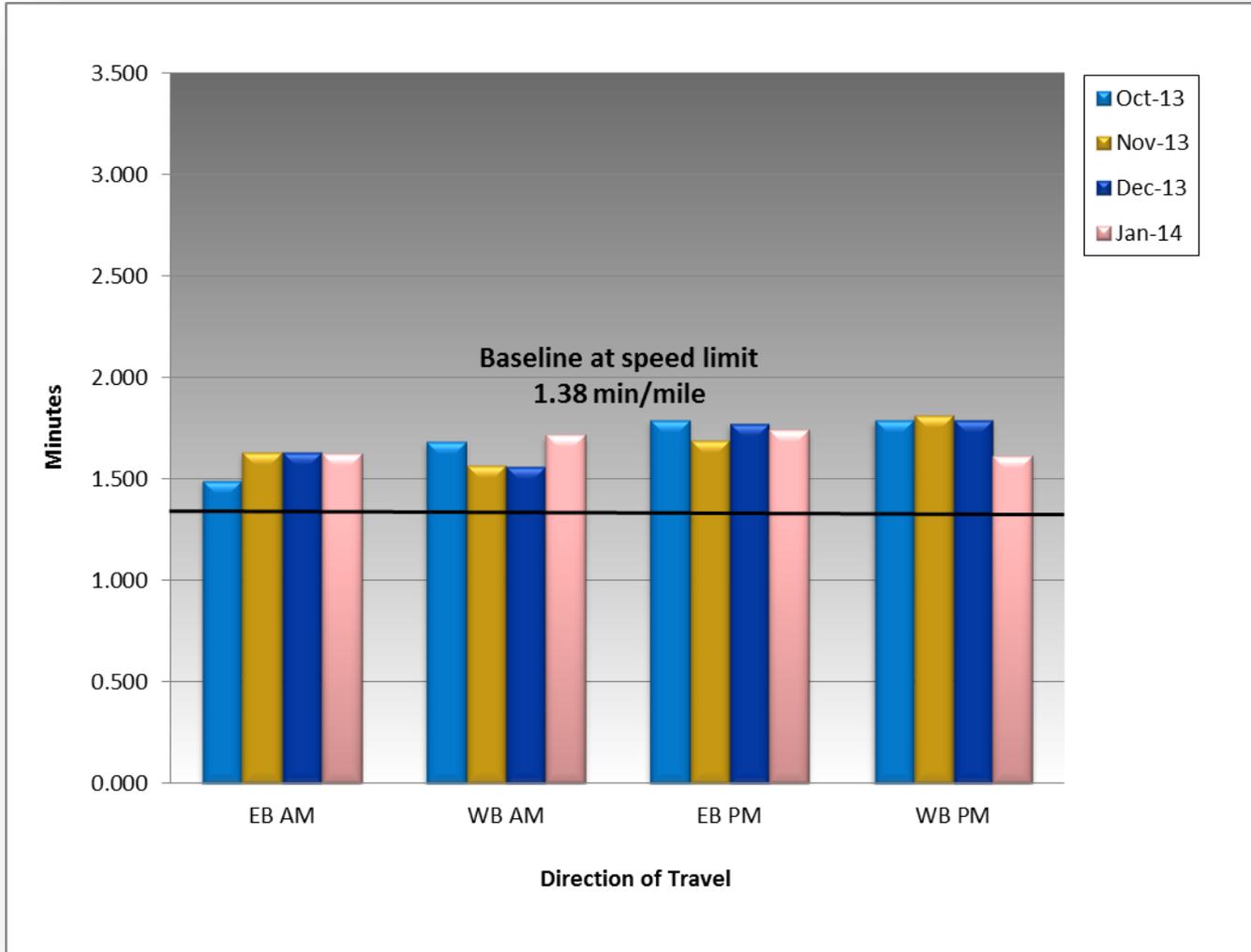
Travel times continue to fluctuate due to varying circumstances. However, all directions showing a decrease in travel times and lower than January 2013 travel times.

The corridor is in its final optimized configuration upon completion of the plans in May.

- Number of Signals - 8
- Length of system - 4.2 miles
- Speed Limit is 40 mph
- Number of Lanes - This is a five lane section with a two way left turn lane.
- Weighted AADT for length of segment - 39500
- AM peak flow is eastbound. PM peak flow is westbound.

This system is currently under construction to install a Sensys Travel Time system.

## US 50, from Union West City Limit to Denmark Franklin County



Travel times are showing an increase for WB AM and a decrease for WB PM. However, the January 2014 travel times are consistent with the January 2013 travel times.

This system had signal optimization timings implemented in early July 2011.

Number of Signals - 6

Length of system - 6.3 miles

Speed Limit varies between 40 mph and 50 mph

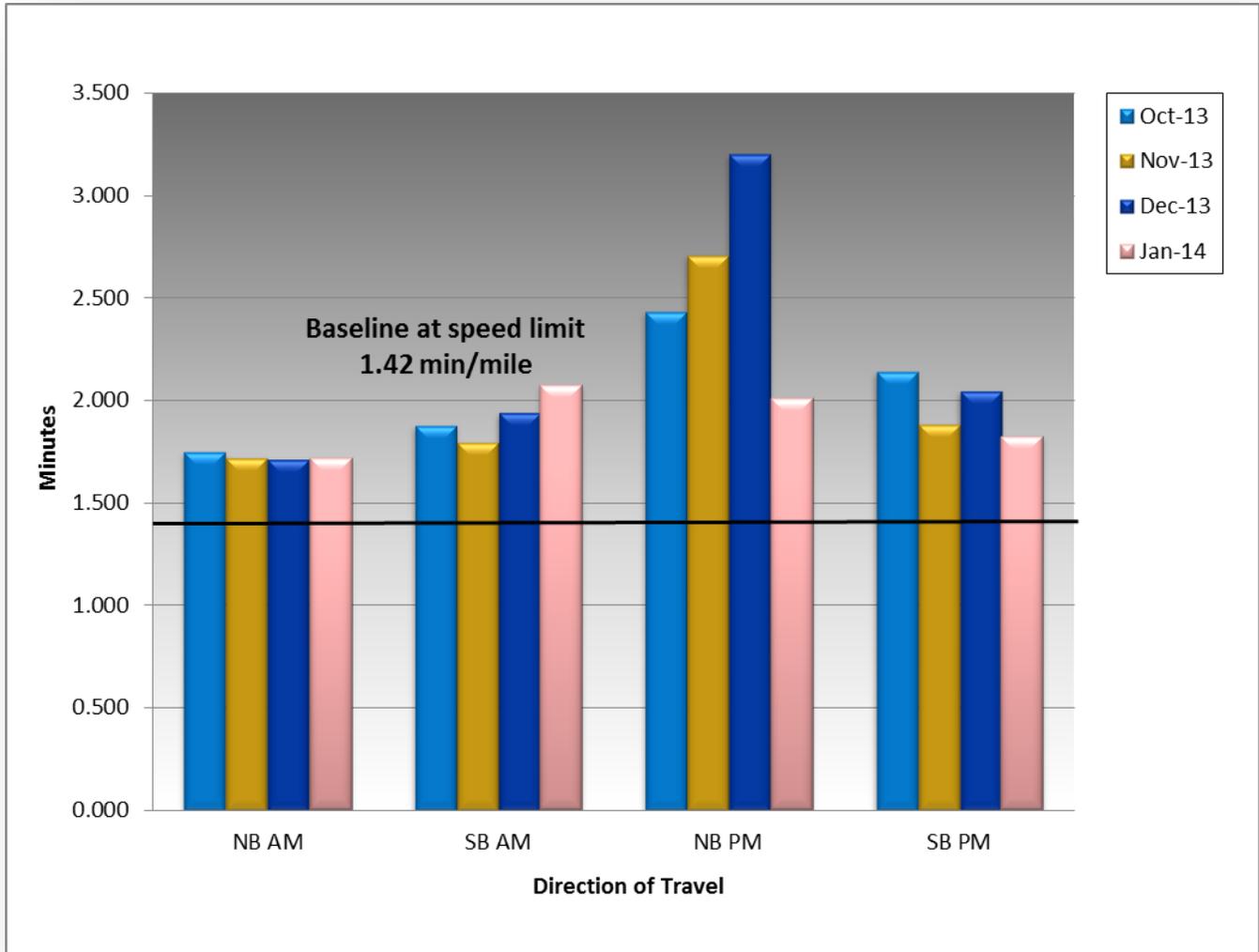
Number of Lanes - This was just recently upgraded to a five lane section.

Weighted AADT for length of segment - 16850

AM peak flow is eastbound. PM peak flow is westbound.

No current plans to install Sensys Travel Time system.

## US 67, from Route 367 to I-270 St. Louis County



Travel times showing some changes except for the NB AM direction, where this time has been stable for past 4 months. Travel times are similar to the travel times of January 2013.

Optimization on this system was completed in 2012. ACS Lite activated early February 2013. Reliability of the results improved since Sensys data was used to generate January 2014 months travel times.

Number of Signals - 19

Length of system - 8.3 miles

Speed Limit varies between 40 mph and 45 mph

Number of Lanes - This is a five lane section with a two way left turn lane.

Weighted AADT for length of segment – 25450

Since June 2011, this system has been providing travel time data based on the Sensys Travel Time system.



## Work Zones

Whenever additional travel time is reported, this additional time shall be evaluated using this chart and adequate mitigation measures should begin within the parameters of this chart. TMC and field personnel are partners in the mitigation of traffic and notification of additional travel times should trigger the appropriate response from both parties.

Chart is designed to be an additional travel time reference to establish parameters for gauging the travel impact through work zones and to provide guidance for taking mitigation actions. Travel times can be collected or reported via Blue Toad technology, field personnel, call reports, ITS, TMC cameras, etc.

Major and Moderate impacts trigger an IAR (Immediate Action Required) event. IAR means work zone user and TMC partner together to take immediate actions to reduce or eliminate distress. During an IAR event mitigation procedures can range from increased driver notification up to and including removal of work zone. Additional mitigation procedures may require involvement of administration through use of the work zone resolution ladder.

Level of Impact	Additional Travel Time Expected	Mitigation Actions
<p><b>Major (Red)</b> <b><u>IAR Event</u></b></p> <p>SEVERE DISTRESS PRESENT</p> <p><b>Return of roadway to free flow traffic is Priority #1</b></p>	<p>15 minutes or above</p> <p>TMC and field personnel take all steps possible up to and including removal of lane closure to achieve free flow threshold</p>	<p><b>Immediate Action Required</b></p> <p>Supervisory mitigation assistance is required using the St. Louis District Work Zone Resolution Ladder as a tool to restore free flow traffic threshold</p>
<p><b>Moderate (Yellow)</b> <b><u>IAR Event</u></b></p> <p>CAUTIONARY STAGE:</p> <p><b>Action required by Field/ TMC to prevent escalation to a major event</b></p>	<p>10 – 14 minutes</p> <p>TMC increases driver messaging. Field begins efforts to restore free flow traffic</p>	<p>TMC and field shall reach a consensus on mitigation success within 15 minutes or less.</p> <p>If a consensus cannot be reached, mitigation should be scaled upwards in accordance with the St. Louis District Work Zone Resolution Ladder</p>



## Incident Levels

### **Major Impact Traffic Incident – Road closure > 2 hours**

Major traffic incidents are typically traffic incidents involving hazardous materials, fatal traffic crashes involving numerous vehicles, and other natural or man-made disasters. These traffic incidents typically involve closing all or part of a roadway facility for a period exceeding 2 hours.

### **Moderate Impact Traffic Incident – Blocked travel lanes/closure 30 min – 2 hours**

Moderate traffic impact incidents typically affect travel lanes for a time period of 30 minutes to 2 hours, and usually require traffic control on the scene to divert road users past the blockage. Full roadway closures might be needed for short periods during traffic incident clearance to allow traffic incident responders to accomplish their tasks.

### **Minor Impact Traffic Incident – Lane closures < 30 minutes**

Minor traffic incidents are typically disabled vehicles and minor crashes that result in lane closures of less than 30 minutes. On-scene responders are typically law enforcement and towing companies, and occasionally highway agency service patrol vehicles.

## Definitions

**511** – Gateway Guide’s phone line for automated call-in travel information in the St. Louis Metro Area

**511 Floodgate Message** – Road closure message sent from the TMC that is read at the beginning of a 511 call and posted to the banner on the website

**ACTRA** – Traffic signal management software program

**Alert** – Email message sent regarding an incident or event on the roadway

**Arterial** – Missouri State Highway Numbered Routes, not fully access controlled

**Arterial Device** – ITS equipment located along MoDOT arterials

**Average Minutes per Mile** – Number of minutes for a vehicle to travel one mile of roadway averaged over a section of roadway

**BlueTOAD** - a (Bluetooth Travel-time Origination and Destination) traffic monitoring system to collect high quality high density travel times by sampling a portion of actual travel times

**DMS** - Dynamic Message Signs along highway displaying incident and travel time information

**Defined Sensor** – A single sensor with an individual ID focused on a particular roadway; multiple defined sensors may be located at one physical sensor location

**Driver messaging** – Messages placed on DMS boards to alert drivers of incidents ahead of their direction of travel

**EOC** – Emergency Operations Center operated by MoDOT in Jefferson City



**ER** – MoDOT’s Emergency Response units that provide emergency assistance during nights and weekends typically not covered by Motorist Assist units

**Freeway Device** – ITS device located along a MoDOT freeway, such as interstates and other fully access controlled highways

**Gatewayguide.com** – Gateway Guide’s website for local St. Louis area traffic information

**GuidePost** – Area of report highlighting important mobility topics for the month

**IDOT** - Illinois Department of Transportation

**KC Scout** – Gateway Guide’s counterpart for the greater Kansas City Metropolitan area, a collaboration involving both MoDOT and the Kansas DOT

**Mobility** – Ease of movement over roadway, through system, and or work zone

**MMU** – Conflict monitor hardware installed at a signal system

**MRB** – Mississippi River Bridge under construction north of downtown St. Louis

**Observed Work zone** – Work zone tracked by traffic cameras at the TMC

**Peak Average** – Daily speed sensor readings over an entire weekday rush commute period averaged for an entire month

**PSB** - Poplar Street Bridge

**Regional Mobility Overview** – Map depicting congestion areas based on speed index ratings derived from speed sensor readings

**Speed Index** – a ratio of the speed at which vehicles travel during a period to the speed at free-flow conditions

**Stats to Watch** – Area of report highlighting interesting trends for the report month, or data to be closely followed

**STLtraffic** – Email group consisting of Gateway Guide personnel and Gateway Guide’s media partners, messages sent to the group are also posted on Twitter

**TMC** – Traffic Management Center (also referred to as Gateway Guide)

**TMC Alert** – Email alert sent to an internal group of Gateway Guide personnel

**VDS** – Video Detection System, signal equipment used to detect vehicles at an intersection

**Visibility**- Concerning placement of traffic signs, signals, devices, barricades and warning lights for safety within work zone or construction area to help motorist and workers move within a work zone safely; Clearly visible and legible, distinguishable to approaching traffic during day and night, aligned with road user’s line of vision, and positioned as to not obstruct other applicable traffic control devices. Must meet MUTCD standards for condition and must be covered, turned or properly stowed when not in use.

**Zoning In** – section of report highlighting important construction topics for the report month

## I-70 Mile Markers

ST. CHARLES COUNTY		ST. CHARLES COUNTY	
5TH ST SOUTH (ST. CHARLES)	229A	229A	5TH ST SOUTH (ST. CHARLES)
5TH ST NORTH (ST. CHARLES)	229B	229B	5TH ST NORTH (ST. CHARLES)
ST. LOUIS COUNTY		ST. LOUIS COUNTY	
BLANCHETTE BRIDGE	230	230	BLANCHETTE BRIDGE
EARTH CITY EXPRESSWAY SOUTH	231A	231A	EARTH CITY EXPRESSWAY SOUTH
EARTH CITY EXPRESSWAY NORTH	231B	231B	EARTH CITY EXPRESSWAY NORTH
I-270	232	232	I-270
MCKELVEY RD OVERPASS (BRIDGETON)	233	233	MCKELVEY RD OVERPASS (BRIDGETON)
RTE 180/ST. CHARLES ROCK RD (BRIDGETON)	234	234	RTE 180/ST. CHARLES ROCK RD (BRIDGETON)
US 67 SOUTH (BRIDGETON)	235A	235A	US 67 SOUTH (BRIDGETON)
US 67 NORTH (BRIDGETON)	235B	235B	US 67 NORTH (BRIDGETON)
CYPRESS RD (BRIDGETON)	235C	235C	CYPRESS RD (BRIDGETON)
AIRFLIGHT (ST. ANN)	236	236	AIRFLIGHT (ST. ANN)
MCDONNELL OVERPASS (BERKELEY)	237	237	MCDONNELL OVERPASS (BERKELEY)
LAMBERT AIRPORT (BERKELEY)	238A	238A	LAMBERT AIRPORT (BERKELEY)
I-170 NORTH (BERKELEY)	238B	238B	I-170 NORTH (BERKELEY)
I-170 SOUTH (BERKELEY)	238C	238C	I-170 SOUTH (BERKELEY)
NORTH HANLEY (BERKELEY)	239	239	NORTH HANLEY (BERKELEY)
RTE N/FLOISSANT RD (COOL VALLEY)	240A	240A	RTE N/FLOISSANT RD (COOL VALLEY)
BERMUDA DR (NORMANDY)	240B	240B	BERMUDA DR (NORMANDY)
RTE U/LUCAS AND HUNT RD	241B	241B	RTE U/LUCAS AND HUNT RD
JENNINGS STATION RD (PINE LAWN)	242C	242C	JENNINGS STATION RD (PINE LAWN)
ST. LOUIS CITY		ST. LOUIS CITY	
GOODFELLOW (ST. LOUIS)	243A	243A	GOODFELLOW (ST. LOUIS)
RIVERVIEW/BIRCHER (ST. LOUIS)	243B	243B	RIVERVIEW/BIRCHER (ST. LOUIS)
UNION (ST. LOUIS)	244A	244A	UNION (ST. LOUIS)
KINGSHIGHWAY (ST. LOUIS)	244B	244B	KINGSHIGHWAY (ST. LOUIS)
SHREVE (ST. LOUIS)	245A	245A	SHREVE (ST. LOUIS)
WEST FLORISSANT AVE (ST LOUIS)	245B	245B	WEST FLORISSANT AVE (ST LOUIS)
NORTH BROADWAY (ST. LOUIS)	246A	246A	NORTH BROADWAY (ST. LOUIS)
ADELAIDE (ST LOUIS)	246B	246B	ADELAIDE (ST LOUIS)
GRAND (ST. LOUIS)	247	247	GRAND (ST. LOUIS)
SALISBURY (ST LOUIS)	248A	248A	SALISBURY (ST LOUIS)
BRANCH (ST LOUIS)	248B	248B	BRANCH (ST LOUIS)
MADISON (ST LOUIS)	249A	249A	MADISON (ST LOUIS)
PINE ST OVERPASS (ST LOUIS)	250	250	PINE ST OVERPASS (ST LOUIS)
CHESTNUT ST OVERPASS (ST LOUIS)	250	250	CHESTNUT ST OVERPASS (ST LOUIS)
MARKET ST OVERPASS (ST. LOUIS)	250	250	MARKET ST OVERPASS (ST. LOUIS)
WALNUT ST OVERPASS (ST LOUIS)	250	250	WALNUT ST OVERPASS (ST LOUIS)

I-70 DISTRICT 6 WESTBOUND  
I-70 DISTRICT 6 EASTBOUND

## I-70 St. Charles County Mile Markers

RTE A (WENTZVILLE)	212	I-70 DISTRICT 6 EASTBOUND I-70 DISTRICT 6 WESTBOUND	212	RTE A (WENTZVILLE)
LAKE ST. LOUIS BLVD (LAKE ST. LOUIS)	214		214	LAKE ST. LOUIS BLVD (LAKE ST. LOUIS)
BRYAN RD (O'FALLON)	216		216	BRYAN RD (O'FALLON)
RTE K/RTE M (O'FALLON)	217		217	RTE K/RTE M (O'FALLON)
T.R. HUGHES BLVD (O'FALLON)	218		218	T.R. HUGHES BLVD (O'FALLON)
RTE 79 (ST. PETERS/O'FALLON)	220		220	RTE 79 (ST. PETERS/O'FALLON)
RTE C/MID RIVERS MALL DR (ST. PETERS)	222		222	RTE C/MID RIVERS MALL DR (ST. PETERS)
SPENCER RD OVERPASS (ST. PETERS)	223		223	SPENCER RD OVERPASS (ST. PETERS)
RTE 370 (ST. PETERS)	224		224	RTE 370 (ST. PETERS)
CAVE SPRINGS (ST. CHARLES)	225		225	CAVE SPRINGS (ST. CHARLES)
ZUMBEHL RD (ST. CHARLES)	227		227	ZUMBEHL RD (ST. CHARLES)
HAWK'S NEST OVERPASS (ST. CHARLES)	227		227	HAWK'S NEST OVERPASS (ST. CHARLES)
RTE 94 (ST. CHARLES)	228		228	RTE 94 (ST. CHARLES)
5TH ST SOUTH (ST. CHARLES)	229A		229A	5TH ST SOUTH (ST. CHARLES)
5TH ST NORTH (ST. CHARLES)	229B		229B	5TH ST NORTH (ST. CHARLES)

## I-270 Mile Markers

3	KOCH RD	I-255 WESTBOUND I-255 EASTBOUND I-270 DISTRICT 6 COUNTER CLOCKWISE FROM RIVERVIEW DR. TO I-55 I-270 DISTRICT 6 CLOCKWISE FROM I-55 TO RIVERVIEW DR.	KOCH RD	3
2	SR 231 (TELEGRAPH RD)		SR 231 (TELEGRAPH RD)	2
1C	US61-67		US61-67	1B
1B	<b>I-55 NORTH</b>		<b>I-55 NORTH</b>	1B
1	<b>I-55 SOUTH</b>		<b>I-55 SOUTH</b>	1A
2	SR 21 (TESSON FERRY RD.)		SR 21 (TESSON FERRY RD.)	2
3	SR 30 (GRAVOIS RD.)		SR 30 (GRAVOIS RD.)	3
5	I-44 EAST/SR 366 (WATSON RD.)		<b>I-44 EAST</b>	5
5	<b>I-44 WEST</b>		<b>I-44 WEST</b>	5
			BIG BEND RD.	7
8	DOUGHERTY FERRY RD.		DOUGHERTY FERRY RD.	8
10	SR 100 (MANCHESTER RD.)		SR 100 (MANCHESTER RD.)	10
12	I-64 EAST/WEST/US 40-61 NORTH/SOUTH		I-64 EAST/WEST/US 40-61 NORTH/SOUTH	12 A/B
13	SR AB (LADUE RD)		SR AB (LADUE RD)	13
14	SR 340 (OLIVE BLVD)		SR 340 (OLIVE BLVD)	14
16	SR D (PAGE AVE.) EAST		SR D (PAGE AVE.) EAST	16A
16	SR 364 WEST		SR 364 WEST	16B
17	DORSETT RD		DORSETT RD	17
20	<b>I-70 WEST/EAST</b>		<b>I-70 WEST</b>	20B
			<b>I-70 EAST</b>	20A
20C	SR 180 (ST. CHARLES ROCK RD)		SR 180 (ST. CHARLES ROCK RD)	20C
22	MISSOURI BOTTOM RD/370 WEST		SR 370 WEST	22D
23	MCDONNELL BLVD		MCDONNELL BLVD	23
25A	US 67 SOUTH		US 67 NORTH	25A
25B	US 67 NORTH		US 67 SOUTH	25B
26	HANLEY/GRAHAM RD.		<b>I-170 SOUTH (EXIT LEFT)</b>	26A
26	<b>I-170 SOUTH</b>		HANLEY/GRAHAM	26B
27	NEW FLORISSANT RD		NEW FLORISSANT RD	27
28	WASHINGTON/ELIZABETH RD.		ELIZABETH/WASHINGTON	28
29	WEST FLORISSANT RD		WEST FLORISSANT RD	29
30	SR AC HALLS FERRY RD		SR AC NEW HALLS FERRY RD	30
			NEW HALLS FERRY RD.	30A
31A	<b>SR 367 SOUTH</b>		<b>SR 367 SOUTH</b>	31A
31B	<b>SR 367 NORTH</b>		<b>SR 367 NORTH</b>	31B
32	BELLEFONTAINE RD	BELLEFONTAINE RD	32	
33	LILAC AVE.	LILAC AVE.	33	
34	RIVERVIEW DR.	RIVERVIEW DR.	34	

## I-64 Mile Markers

<b>I-70 WEST EXIT RIGHT/EAST EXIT LEFT</b>	1	1A	<b>I-70 WEST</b>
		1B	<b>I-70 EAST</b>
PROSPECT RD	1C	1C	PROSPECT RD
LAKE ST. LOUIS BLVD	2	2	LAKE ST. LOUIS BLVD
SR N	4	4	MO N
SR DD/WINGHAVEN	6	6	MO DD/Winghaven
SR K/SR 94	9	9	MO K
		10	MO 94
MISSOURI RESEARCH PARK/TECHNOLOGY DR	12	11	RESEARCH PARK CRL
DANIEL BOONE BRIDGE	13	13	DANIEL BOONE BRIDGE
CHESTERFIELD AIRPORT RD	14	14	SPIRIT OF ST LOUIS BLVD
		16	LONG RD
BOONE'S CROSSING	17	17	BOONE'S CROSSING
CHESTERFIELD PKWY	19A	19A	CHESTERFIELD PKWY
SR 340 (OLIVE/CLARKSON)	19B	19B	MO 340 (OLIVE/CLARKSON)
		20	CHESTERFIELD PKWY
TIMBERLAKE MANOR PKWY	21	21	TIMBERLAKE MANOR PKWY
SR 141	22	22	MO 141 (WOODS MILL RD)
MASON RD	23	23	MARYVILLE CENTRE DR
		24	MASON RD
<b>I-270 SOUTH</b>	25A	25A	<b>I-270 SOUTH</b>
<b>I-270 NORTH</b>	25B	25B	<b>I-270 NORTH</b>
SR JJ (BALLAS RD)	26	26	MO JJ (BALLAS RD)
SPOEDE RD	27	27	SPOEDE RD
US 61-67	28A	28A	US 61-67
		28B	CLAYTON RD
MCKNIGHT RD	30	30	MCKNIGHT RD
BRENTWOOD/HANLEY RD	31B	31A	<b>I-170 NORTH</b>
<b>I-170 NORTH</b>	31A	31B	HANLEY RD/BRENTWOOD BLVD
BELLEVUE AVE	33B	33A	BIG BEND BLVD
BIG BEND	33A	<b>ST. LOUIS CITY</b>	
MCCAUSLAND	33C	33C	MCCAUSLAND AVE
<b>ST. LOUIS CITY</b>		34A	CLAYTON RD/SKINKER BLVD
HAMPTON AVE/OAKLAND AVE	34B	34B	HAMPTON AVE
		36A	KINGSHIGHWAY
KINGSHIGHWAY	36A	36B	BOYLE
VANDEVENTER AVE	36C		
MARKET ST/BERNARD ST	37A	38A	FOREST PARK AVE/GRAND BLVD
GRAND AVE	37B	38B	MARKET ST AT 3000 WEST
JEFFERSON AVE	38A	39A	MARKET ST AT 21ST
CHESTNUT AT 20TH ST	38B	40A	STADIUM/9TH ST/ TUCKER BLVD
14TH ST	39B	40C	<b>I-44 WB/I-55 SB/ I-70 WB</b>
11TH ST EXIT LEFT	39C		
BROADWAY/7TH ST (LAST MISSOURI EXIT)	40B		

I-64 DISTRICT 6 WESTBOUND

I-64 DISTRICT 6 EASTBOUND

## I-55 Mile Markers

JEFFERSON COUNTY		JEFFERSON COUNTY	
RTE M	185	185	RTE M
MAIN ST(IMPERIAL)	186	186	MAIN ST(IMPERIAL)
RICHARDSON RD (ARNOLD)	190	190	RICHARDSON RD (ARNOLD)
RTE 141 (ARNOLD)	191	191	RTE 141 (ARNOLD)
ST. LOUIS COUNTY		ST. LOUIS COUNTY	
MERAMEC BOTTOM RD	193	193	MERAMEC BOTTOM RD
BUTLER HILL RD	195	195	BUTLER HILL RD
<b>I-255 EAST</b>	196A	196A	<b>I-255 EAST</b>
<b>I-270 NORTH</b>	196B	196B	<b>I-270 NORTH</b>
US67/LINDBERGH	197	197	US67/LINDBERGH
REAVIS BARRACKS RD	199	199	REAVIS BARRACKS RD
UNION RD	200	200	UNION RD
BAYLESS	201A	201A	BAYLESS
WEBER RD	201B	201B	WEBER RD
ST. LOUIS CITY		ST. LOUIS CITY	
GERMANIA (ST. LOUIS)	202B	202B	GERMANIA (ST. LOUIS)
LOUGHBOROUGH AVE (ST. LOUIS)	202C	202C	LOUGHBOROUGH AVE (ST. LOUIS)
BATES (ST. LOUIS)	203	203	BATES (ST. LOUIS)
BROADWAY (ST. LOUIS)	204	204	BROADWAY (ST. LOUIS)
GASCONADE (ST. LOUIS)	205	205	GASCONADE (ST. LOUIS)
ARSENAL (ST. LOUIS)	206C	206C	ARSENAL (ST. LOUIS)
SIDNEY OVERPASS	206	206	SIDNEY OVERPASS
GRAVOIS AVE OVERPASS	207	207	GRAVOIS AVE OVERPASS
<b>I-44 WEST (ST. LOUIS)</b>	207	207	<b>I-44 WEST (ST. LOUIS)</b>
7TH ST/PARK AVE (ST. LOUIS)	208	208	7TH ST/PARK AVE (ST. LOUIS)

I-55 DISTRICT 6 SOUTHBOUND

## I-44 Mile Markers

FRANKLIN COUNTY		FRANKLIN COUNTY	
PACIFIC	257	257	PACIFIC
<b>ST. LOUIS COUNTY</b>		261	ALLENTON/SIX FLAGS
ALLENTON/SIX FLAGS	261	<b>ST. LOUIS COUNTY</b>	
RTE 109/RTE W	264	264	RTE 109/RTE W
WILLIAMS RD	265		
LEWIS RD	266	266	LEWIS RD
		269	ANTIRE
RTE 141	272	272	RTE 141
BOWLES	274	274	BOWLES
MRAZ	274		
		275	SOCCER PARK
<b>I-270 NORTH</b>	276B	276B	<b>I-270 NORTH</b>
<b>I-270 SOUTH</b>	276A	276A	<b>I-270 SOUTH</b>
RTE 366/WATSON	277A		
US 67/LINDBERGH	277B	277B	US 67/LINDBERGH
BIG BEND	278	278	BIG BEND
		279	BERRY
ELM	280	280	ELM
LACLEDE STATION	282		
<b>ST. LOUIS CITY</b>		283	SHREWSBURY
JAMIESON	284A	<b>ST. LOUIS CITY</b>	
		284B	ARSENAL
		285	SOUTHWEST
HAMPTON	286	287	KINGSHIGHWAY
KINGSHIGHWAY	287	288	GRAND AVE
GRAND AVE	288	289	JEFFERSON AVE
JEFFERSON AVE	289		
<b>I-55 SOUTH</b>	290A		
18TH ST	290B	290C	12TH ST./GRAVOIS

I-44 DISTRICT 6 WESTBOUND  
I-44 DISTRICT 6 EASTBOUND

## I-170 Mile Markers

I-64 WEST/US 40-61	1A	I-170 DISTRICT 6 SOUTHBOUND	I-170 DISTRICT 6 NORTHBOUND		
I-64 EAST/US 40-61	1B				
				1C	GALLERIA PARKWAY
BRENTWOOD BLVD	1D				
FOREST PARK PARKWAY	1E			1E	FOREST PARK PARKWAY
LADUE RD	1F			1F	LADUE RD
DELMAR	2			2	DELMAR
EAST/3B WEST SR 340 (OLIVE BLVD)	3A			3	SR 340 (OLIVE BLVD)
SRD/SR 364 (PAGE AVE)	4			4	SR D/SR 364 (PAGE AVE)
SR 180 (ST. CHARLES ROCK RD)	5			5	SR 180 (ST. CHARLES ROCK RD)
SR 115 (NATURAL BRIDGE RD)	6			6	SR 115 (NATURAL BRIDGE RD)
I-70 EAST (EXIT LEFT)	7A			7A	I-70 EAST (EXIT RIGHT)
I-70 WEST (EXIT RIGHT)	7B			7B	I-70 WEST (EXIT LEFT)
				7C	LAMBERT ST. LOUIS AIRPORT
SCUDDER	8			8	SCUDDEN/N. HANLEY RD
AIRPORT RD	9A			9A	AIRPORT
				9B	BOEING (EXIT LEFT)
				9C	N. HANLEY RD
				10A	I-270 WEST (EXIT RIGHT)
		10B	I-270 EAST (EXIT LEFT)		

## SR 364 Mile Markers

		SR 364 EASTBOUND	SR 364 WESTBOUND	11B	HARVESTER RD
				12	HERITAGE CROSSING/JUNGS STATION RD
SR94 EAST/ST. CHARLES	13			13	SR 94 EAST/MUEGGE RD
ARENA PKWY/UPPER BOTTOM RD	14			14	UPPER BOTTOM/ARENA
MARYLAND HEIGHTS EXPRESSWAY	17			17	MARYLAND HEIGHTS EXPRESSWAY
				21	BENNINGTON PL
I-270 SOUTH	22A				
I-270 NORTH	22B				

## SR 370 Mile Markers

		SR 370 WESTBOUND SR 370 EASTBOUND	1A	I-70 WESTBOUND
			1B	I-70 EASTBOUND
			1C	SPENCER RD
TRUMAN/CAVE SPRINGS RD	2		2	TRUMAN/CAVE SPRINGS RD
ELM/NEW TOWN BLVD	5		5	ELM/NEW TOWN BLVD
N 3RD ST/SR 94	7		7	N 3RD ST/SR 94
DISCOVERY BRIDGE ST. CHAS CO/ ST. LOUIS CO	8		8	DISCOVERY BRIDGE ST. LOUIS CO/ ST. CHAS CO
EARTH CITY EXPRESSWAY	9		9	EARTH CITY EXPRESSWAY
ST. LOUIS MILLS BLVD	11		11	ST. LOUIS MILLS BLVD
MISSOURI BOTTOM RD	12			
I-270 WEST BOUND	12			
I-270 EAST BOUND	12			

## SR 21 Mile Markers

RT B	164.8	SR 21 NORTHBOUND SR 21 SOUTHBOUND	164.8	RT B
RT BB	165.4		165.4	RT BB
STADIUM DR UNDERPASS	166.4		166.4	STADIUM DR UNDERPASS
RTE A	167.8		167.8	RTE A
SAND CREEK	169		169	SAND CREEK
HAYDEN RD	169.2		169.2	HAYDEN RD
GLADE CHAPEL RD OVERPASS	171.4		171.4	GLADE CHAPEL RD OVERPASS
OLD HWY 21 (GOLDMAN)	172.6		172.6	OLD HWY 21 (GOLDMAN)
KLABLE RD OVERPASS	174.2		174.2	KLABLE RD OVERPASS
SCHENK RD OVERPASS	175.2		175.2	SCHENK RD OVERPASS
HEADS CREEK	176.4		176.4	HEADS CREEK
RT MM	177.7		177.7	RT MM
W. FOUR RIDGE RD OVERPASS	179		179	W. FOUR RIDGE RD OVERPASS
OLD HWY 21 (SHADY VALLEY)	180.4		180.4	OLD HWY 21 (SHADY VALLEY)
OLD HWY 21 UNDERPASS	182		182	OLD HWY 21 UNDERPASS
WEST ROCK CREEK RD OVERPASS	182.8		182.8	WEST ROCK CREEK RD OVERPASS
OLD HWY 21 OVERPASS	183.2		183.2	OLD HWY 21 OVERPASS
LONDELL RD	184.2		184.2	LONDELL RD
OLD HWY 21	184.5		184.5	OLD HWY 21
SR 141	185.6		185.6	SR 141

