

# Vital Signs Report

*A Scorecard of Metro's*

*Key Performance Indicators (KPI)*

*2012 3rd Quarter Results*



**Office of Performance**

Chief Performance Officer

Published: November 2012

*Page Left Intentionally Blank*

## **Introduction to this report**

As a regional transportation system, Metro's system-wide performance is captured in the Vital Signs Report. The Vital Signs Report provides analysis of a small number of key performance indicators (KPI's) that monitor long term progress in the strategic areas of safety, security, service reliability and customer satisfaction.

The report is not designed to measure the experience of individual customers using Metro's services. Instead, the Vital Signs Report communicates if the Metro system's performance is improving, worsening or remaining steady.

Detailed performance analysis is presented in the Vital Signs Report through answers to two prime questions: Why did performance change? What actions are being taken to improve performance? Metro is focused on these two questions to continually drive improvement.

The Vital Signs Report demonstrates Metro's commitment to be transparent and accountable to our Board of Directors, jurisdictional stakeholders and the public. This report documents performance results and strives to hold WMATA's management accountable for what is working, what is not working, and why.

*Page Left Intentionally Blank*

## Table of Contents

---

Introduction to this report .....	3
Strategic Framework.....	6
KPI's that Score How Metro is Performing.....	7
Bus On-Time Performance (Jul - Sep).....	7
Bus Fleet Reliability (Jul - Sep).....	8
Rail On-Time Performance (Jul - Sep) .....	9
Rail Fleet Reliability (Jul - Sep).....	10
MetroAccess On-Time Performance (Jul - Sep) .....	11
Escalator System Availability (Jul - Sep).....	12
Elevator System Availability (Jul - Sep) .....	13
Customer Injury Rate (Jul - Sep).....	14
Employee Injury Rate (Jul - Sep) .....	15
Crime Rate (Jun - Aug) .....	16
Customer Comment Rate (Jul - Sep) .....	17
Definitions .....	18
Performance Data.....	20
Metro Facts at a Glance.....	25

## Strategic Framework Overview

There are five strategic goals that provide a framework to quantify and measure how well Metro is performing. Each of the goals has underlying objectives intended to guide all employees in the execution of their duties. Although Metro is working on all goals and objectives only a select number of performance measures are presented in the Vital Signs Report to provide a high-level view of agency progress.

5 Goals

- |       |  |
|-------|--|
| Goals | <ol style="list-style-type: none"> <li>1. <u>Create</u> a Safer Organization</li> <li>2. <u>Deliver</u> Quality Service</li> <li>3. <u>Use</u> Every Resource Wisely</li> <li>4. <u>Retain, Attract</u> and <u>Reward</u> the Best and Brightest</li> <li>5. <u>Maintain</u> and <u>Enhance</u> Metro's Image</li> </ol> |
|-------|--|

12 Objectives

Goal	Objective
1	1.1 <u>Improve</u> customer and employee safety and security ("prevention")*
	1.2 <u>Strengthen</u> Metro's safety and security response ("reaction")
2	2.1 <u>Improve</u> service reliability
	2.2 <u>Increase</u> service and capacity to relieve overcrowding and meet future demand
	2.3 <u>Maximize</u> rider satisfaction through convenient, comfortable services and facilities that are in good condition and easy to navigate
	2.4 <u>Enhance</u> mobility by improving access to and linkages between transportation options
3	3.1 <u>Manage</u> resources efficiently
	3.2 <u>Target</u> investments that reduce cost or increase revenue
4	4.1 <u>Support</u> diverse workforce development through management, training and provision of state of the art facilities, vehicles, systems and equipment
5	5.1 <u>Enhance</u> communication with customers, employees, Union leadership, Board, media and other stakeholders
	5.2 <u>Promote</u> the region's economy and livable communities
	5.3 <u>Use</u> natural resources efficiently and reduce environmental impacts

\*WMATA Board of Directors System Safety Policy states:

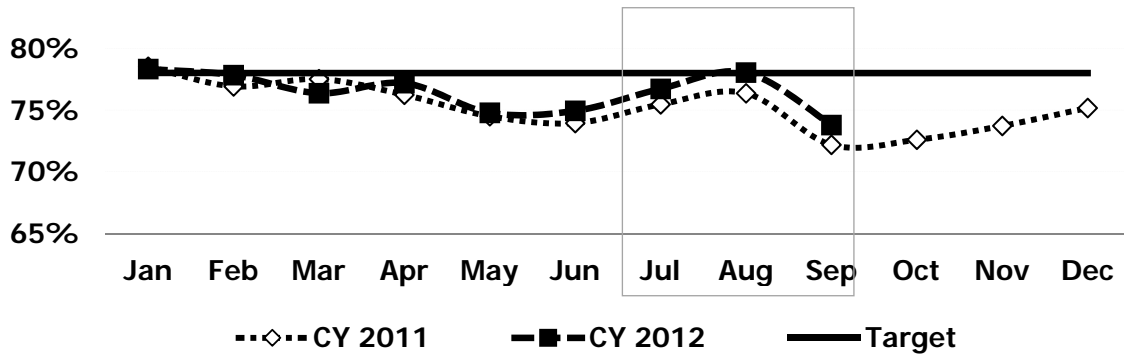
1. To avoid loss of life, injury of persons and damage or loss of property;
2. To instill a commitment to safety in all WMATA employees and contractor personnel; and
3. To provide for the identification and control of safety hazards, the study of safety requirements, the design, installation and fabrication of safe equipment, facilities, systems, and vehicles, and a systematic approach to the analysis and surveillance of operational safety for facilities, systems, vehicles and equipment.

**Reason to Track:** This indicator illustrates how closely Metrobus adheres to published route schedules on a system-wide basis. Factors which affect on-time performance are traffic congestion, inclement weather, scheduling, vehicle reliability, and operational behavior. Bus on-time performance is essential to delivering quality service to the customer. For this measure higher is better.

**Why Did Performance Change?**

- Third quarter (Q3/2012) bus on-time performance is two percent better than the same quarter of the prior year. Various initiatives have contributed to this improvement; from improved coordination between the scheduling team and Operations to service changes. Constant evaluation of the best utilization of Service Operation Managers (SOMs) continued to be a key contribution as well.
- Customers experienced fewer buses arriving late compared to Q3/2011; there was a 9% decline (improvement) in buses arriving late compared to Q3/2011. However, buses arrived early more frequently compared to Q3/2011 by 4%.
- Customers saw the beneficial effect of service changes like: adding service to high ridership routes, eliminating under-utilized routes, providing service more frequently during peak periods, and adjusting schedules to reflect current traffic condition. These changes were implemented to improve bus on-time performance and reduce overcrowding.
- The realignment of SOMs (the eyes on the street) to troubled routes and pairing them with a Bus Operation Center representative allowed for better and faster response to poor performing routes. This also was a benefit to the scheduling team, as SOMs were better able to recommend service changes based on their observations.

**Bus On-Time Performance**



**Actions to Improve Performance**

- Replace the onboard automated vehicle location equipment and software which will significantly improve the accuracy of NextBus predictions that help SOMs better manage service in real time and improve the customer's experience.
- Replacing the old equipment with more reliable equipment will, for the first time, allow the street supervisors to access the same information (e.g. regional traffic visibility and location of the bus) as the control center allowing for better monitoring and management of schedule adherence.
- Pending public hearing outcomes and Board approval, additional service adjustments will be implemented in 2013 to further improve on-time performance and reduce overcrowding. Potentially 36 lines throughout the District, Maryland and Virginia could experience improved performance.

**Conclusion:** Third quarter (Q3/2012) bus on-time performance is two percent better than the same quarter of the prior year. Various initiatives contributed to this improvement, such as improved coordination between the scheduling team and Operations, service changes, and the constant evaluation of how to better utilize street supervisors.

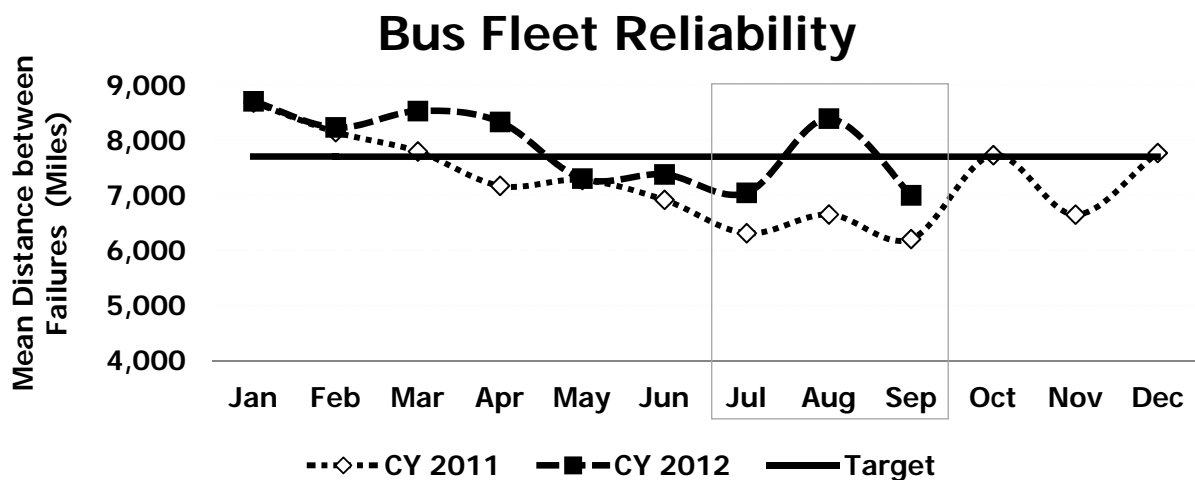
**KPI: Bus Fleet Reliability (Jul - Sep)**  
**(Mean Distance Between Failures)**

**Objective 2.1 Improve Service Reliability**

**Reason to Track:** This key performance indicator communicates service reliability and is used to monitor trends in vehicle breakdowns that cause buses to go out of service and to plan corrective actions. Factors that influence bus fleet reliability are the vehicle age, quality of a maintenance program, original vehicle quality, and road conditions affected by inclement weather and road construction. For this measure higher is better.

**Why Did Performance Change?**

- Bus fleet reliability was 17% better than Q3/2011. Bus Maintenance continued to implement various initiatives to improve performance throughout the fleet.
- Campaigns to correct and eliminate troubles in the engine cooling and emission systems continued on the Hybrid fleets, as well as efforts to reduce summer time problems with air conditioners. The engine cooling and emission problems most commonly contribute to engine shutoffs while buses are in service which can result in customer delays.
- Putting new Clean Diesel buses into service also contributed to better performance, allowing Metro to retire older, less reliable buses.
- More reliable engines continued to be installed on the CNG fleet during the midlife overhaul process (which also contributes to improved performance). There were also a number of corrective measures taken to resolve electronic system-related failures common in the CNG fleet. About 80% of the CNG fleet has been retrofitted with new engines to date.
- Regular preventive maintenance continued on the older Diesel fleet to combat general wear and tear which usually occurs on the fluid hoses.



**Actions to Improve Performance**

- Continue to retrofit the engines of the remaining CNG fleet. Eighty CNG buses have been retrofitted, leaving 20 in the progress of being retrofitted with new engines.
- Continue to replace older Diesel buses, which are approximately 20% of the fleet, with new Hybrids. The new Hybrids tend to have better fleet reliability. Continue to closely evaluate the cause of mechanical failures and develop preventive strategies to reduce the most common causes of bus breakdowns. The top 6 service interruptions year to date are related to: engine, air system, warning lights, door systems, brakes and electrical system failures

**Conclusion:** Bus fleet reliability was 17% better than Q3/2011. Bus Maintenance implemented various initiatives throughout the fleet to improve performance such as retrofitting new, more efficient engines; resolving engine cooling and emission issues that contributed to engine shutoffs; putting new buses into service; and continuing general preventive maintenance measures.

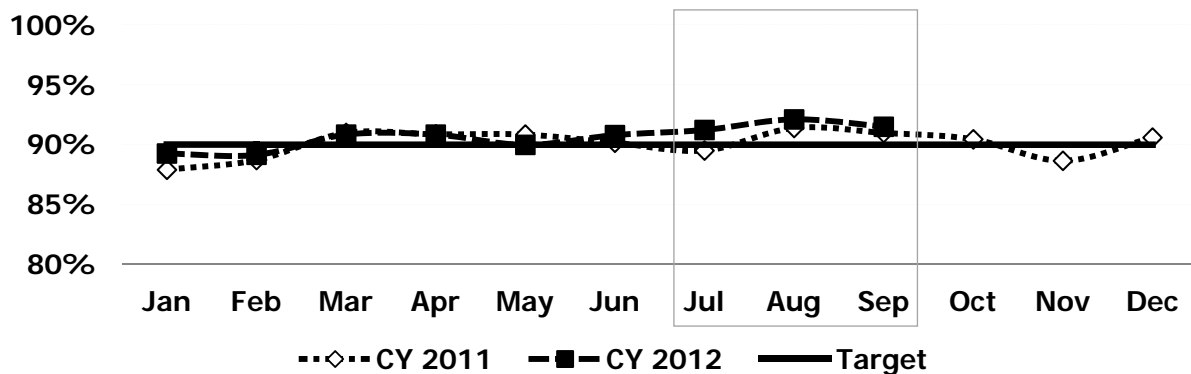


**Reason to Track:** On-time performance measures the adherence to weekday headways, the time between trains. Factors that can affect on-time performance include track conditions resulting in speed restrictions, the number of passengers accessing the system at once, dwell time at stations, equipment failures and delays caused by sick passengers or offloads. For this measure higher is better.

**Why Did Performance Change?**

- Weekday rail on-time performance (OTP) in Q3/2012 remained above target and was 1% better than the same three months of 2011. Metro actively managed OTP, improving performance with the help of more railcars being available for service, limited weekday track work and fewer delays.
- Railcar availability improved in Q3/2012, even with a higher railcar requirement (increased from 860 in Q3/2011 to 896 in Q3/2012).
- Following a seasonal trend, railcar availability dipped in July 2012, but was much better than July of last year (weekday morning rush period car requirements were met 43% of the time in July 2012, compared with only 20% in July 2011). When all the needed cars are not available for service, customers can encounter shorter, more crowded trains that take longer to board and occasionally, larger gaps between trains that reduce on-time performance.
- In Q3/2012, weekday track work primarily occurred in late evenings when fewer customers ride the system, limiting the impact on OTP. This follows many months of weekday mid-day track work in core/interlined areas where Metro service is more frequent and the impact to OTP more significant.
- The number of train delays reduced by 3% in Q3/2012 compared to Q3/2011 (primarily from fewer door, brake and power delays), indicating that maintenance efforts kept railcars and rail infrastructure in better condition.

### Rail On-Time Performance



**Actions to Improve Performance**

- Continue track work in late evenings and weekends to improve reliability of the rail system infrastructure, including testing associated with the Silver Line extension.
- Terminal supervisors will begin using a new tool to monitor system-wide service delivery in order to anticipate impact of delay incidents and minimize large gaps between trains for customers.
- Improve safety and minimize delays by implementing speed restrictions at nine above-ground stations where autumn leaves can make the tracks slippery. This is done to avoid trains skidding to a stop and impact the safety of customers. It also reduces the risk of flat spots on train wheels that can take railcars out of service and cause delays.

**Conclusion:** Metro actively managed Rail OTP in Q3/2012, exceeding the target and Q3/2011 performance due to improved railcar availability, limited weekday track work and fewer delays.

**KPI: Rail Fleet Reliability (Jul - Sep)**  
**(Mean Distance Between Delays)**

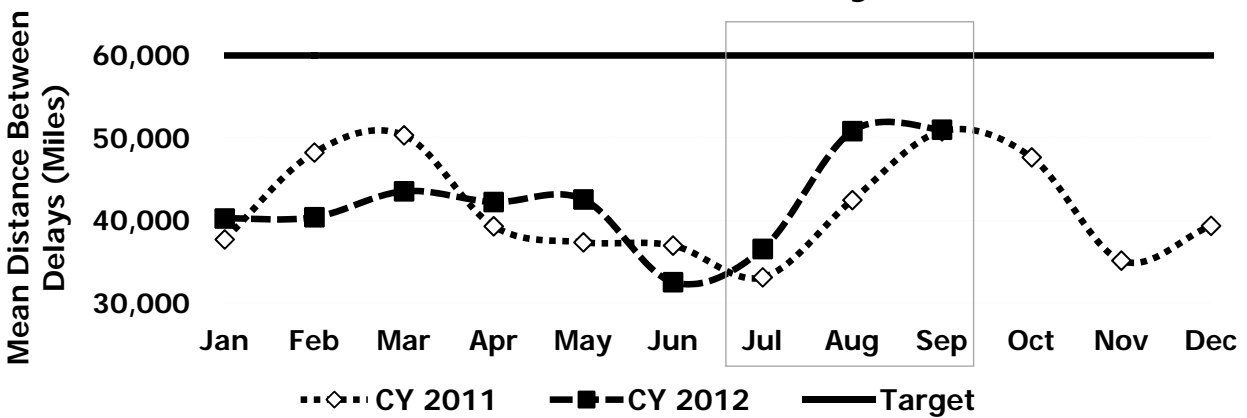
**Objective 2.1 Improve Service Reliability**

**Reason to Track:** Mean distance between delays (MDBD) communicates the effectiveness of Metro’s railcar maintenance program. This measure reports the number of miles between railcar failures resulting in delays of service greater than three minutes. Factors that influence railcar reliability are the age of the railcars, the amount the railcars are used and the interaction between railcars and the track. For this measure higher is better.

**Why Did Performance Change?**

- Overall, railcar reliability for the quarter improved 10% compared to Q3/2011. Railcar reliability in July and August were much better than in 2011, due to improved management of HVAC failures, resulting in fewer delays. September reliability was on par with September 2011.
- Railcar reliability improvement has been achieved as the number of vehicles needed to meet the schedule has increased, resulting in more miles operated. The number of miles operated during Q3/2012 was 9.8% higher than in 2011 due to service increases implemented in June 2012.
- Reduction in the number and duration of delays due to doors was the largest category of improvement, contributing to improved on-time performance. The 2-3K fleet performance has been improving steadily (34% better than Q3/2011). The improvement was primarily due to a modification on the door system brake mechanism. This same modification was also underway on the 6K railcars. Troubleshooting and relay replacement programs were completed in September.
- There were fewer brake delays on the 1K fleet throughout the quarter, contributing to 18% improvement in the reliability over Q3/2011, partly as a result of how cars are assigned to trains.
- Brake system campaign work was completed on the 5K railcars. The 5K fleet was 12% more reliable in Q3 2012 compared with 2011. Brakes and doors are the two most common types of delays caused by railcars.

**Rail Fleet Reliability**



**Actions to Improve Performance**

- In conjunction with implementation of speed restrictions, monitor railcars for flats on the wheels during the fall months.
- Continue to perform preventive maintenance inspections on all railcars to ensure that the railcars released each day for revenue service stay in service throughout their scheduled shift.
- Begin planning for the January 2013 inauguration service requirements by hardening the fleet (preventive maintenance) as much as possible.

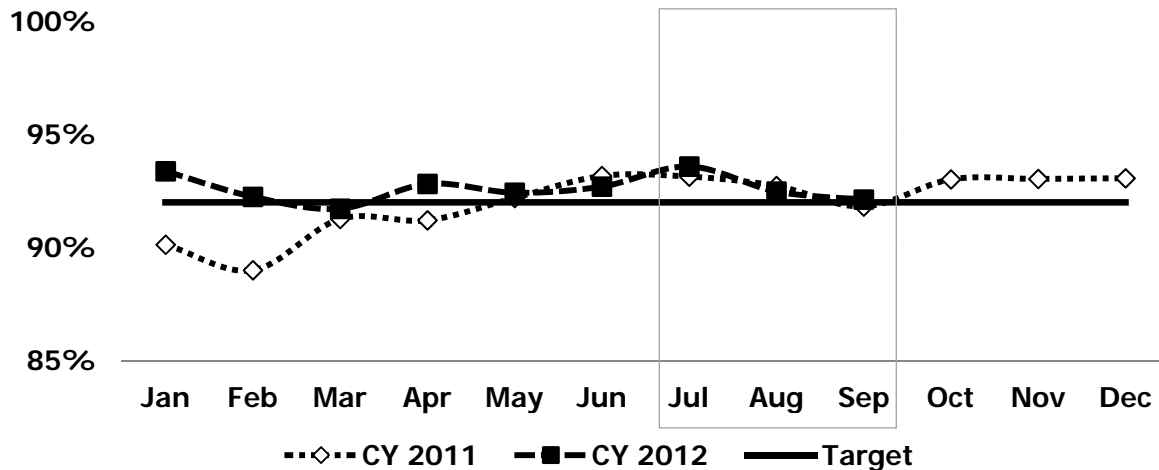
**Conclusion:** Railcar reliability improved 10% for Q3 compared to last year, finishing the quarter with September performance on par with September 2011.

**Reason to Track:** On-time performance is a measure of MetroAccess service reliability and how well service meets both regulatory and customer expectations. Adhering to the customer's scheduled pick-up window is comparable to Metrobus adhering to scheduled timetables. Factors which affect on-time performance are traffic congestion, inclement weather, scheduling, vehicle reliability and operational behavior. MetroAccess on-time performance is essential to delivering quality service to customers, and meeting service criteria established through Federal Transit Administration regulatory guidance. For this measure higher is better.

**Why Did Performance Change?**

- MetroAccess' on-time performance remained above the target of no less than 92% for Q3/2012. Outperforming Q3/2011 by 0.2%.
- MetroAccess improved the consistency of service delivery through managing its telephone call center response time, which included addressing calls about trips in real time, and communicating effectively with drivers. Handling calls effectively (100% within the target) has contributed to a 33% reduction in the percentage of trips that were very late to an average of 0.6%, below the target of 1.5%.

### MetroAccess On-Time Performance



**Actions to Improve Performance**

- Continue the practice of effectively using dedicated vehicles in scheduling trips to the maximum extent feasible.
- Continue to evaluate the schedule to achieve schedule productivity targets, while also managing on-time performance.
- Continue to encourage customers to be responsible for cancelling their trips in advance whenever possible, so vehicles can be more efficiently routed.

**Conclusion:** MetroAccess continued to provide service on-time, exceeding its target for Q3/2012.

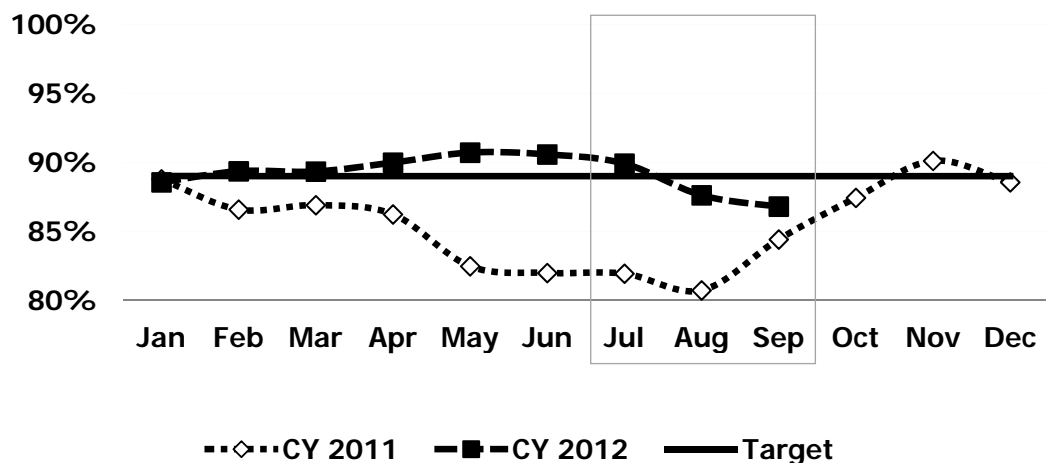
**KPI: Escalator System Availability (Jul - Sep)      Objective 2.1 Improve Service Reliability**

**Reason to Track:** Customers access Metrorail stations via escalators to the train platform. An out-of-service escalator requires walking up or down a stopped escalator, which can add to total travel time and may make stations inaccessible to some customers. Escalator availability is a key component of customer satisfaction with Metrorail service. This measure communicates system-wide escalator performance (at all stations over the course of the day) and will vary from an individual customer's experience. For this measure higher is better.

**Why Did Performance Change?**

- System-wide escalator availability in Q3/2012 was 7% better than last year due to improvements in unscheduled maintenance. An increase in inspection repairs from Q2/2012 reduced availability as mechanics resolved identified repairs.
- In Q3/2012, fewer units went out of service unexpectedly than last year (down 14%) and repairs were less time intensive (Mean Time to Repair improved 30%), indicating that the underlying health of escalators is improving.
- Continued emphasis on safety inspections to monitor compliance with customer safety requirements resulted in the identification and resolution of needed repairs (e.g., lighting, safety switches), accounting for 24% of out-of-service hours in Q3/2012, up from 12% in Q2/2012.
- Hours dedicated to modernizing/replacing escalators were 24% higher than Q3/2011 and accounted for 25% of out-of-service hours in Q3/2012. This critical work took 29 units out of service at 10 stations.

**Escalator System Availability**



**Actions to Improve Performance**

- Complete complex replacement project at Dupont Circle South Entrance, removing three of Metro's least reliable escalators and replacing with new, heavy duty units.
- Continue to closely monitor availability trends by escalator maintenance team, focusing maintenance resources on stations with the lowest availability.
- Engineers will identify structural issues caused by previous water intrusion into escalators and determine necessary actions to correct problems.
- Hire additional mechanics (FY13 Budget Initiative) to improve escalator maintenance.

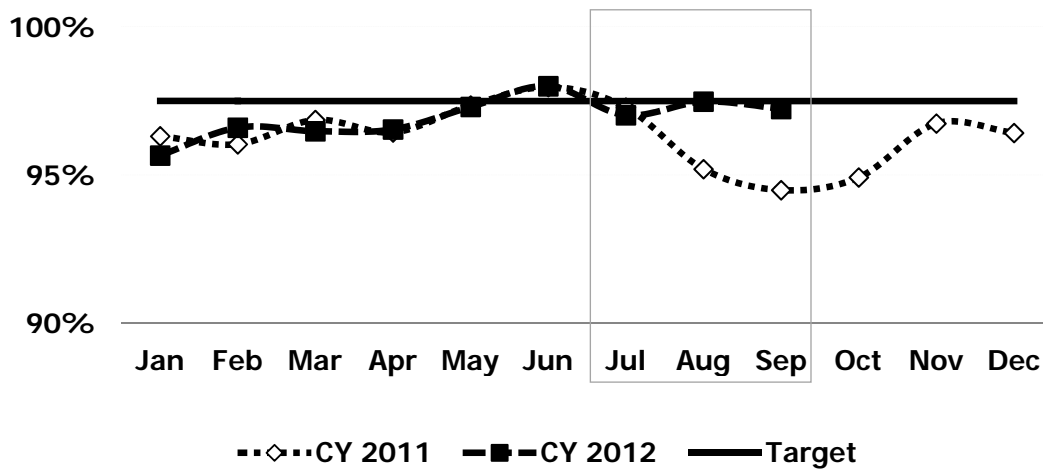
**Conclusion:** System-wide escalator availability in Q3/2012 was 7% better than last year as escalator health improved, reducing unscheduled outages.

**Reason to Track:** Metrorail elevators provide an accessible path of travel for persons with disabilities, seniors, customers with strollers, travelers carrying luggage and other riders. When an elevator is out of service, Metro is required to provide alternative services, which may include a shuttle bus service to another station. For this measure higher is better.

**Why Did Performance Change?**

- System-wide elevator availability in Q3/2012 was close to the target and significantly better than last year due to better preventive maintenance practices, water remediation improvements and redeploying/adding staff. These actions led to fewer and shorter unscheduled outages, more than offsetting a notable increase in scheduled modernizations.
- Better elevator preventive maintenance (PM) practices began to pay off as mechanics resolved problems before units went out of service unexpectedly (unscheduled outages decreased 36% from Q3/2011). PM compliance improved 63% compared with Q3/2011.
- Work by Metro engineers to prevent rain and ground water from entering elevator wellways began to show positive results. Out-of-service hours for elevators damaged by water intrusion were down 79% from Q3/2011.
- Elevator repairs were completed more quickly (Mean Time to Repair improved 60% compared to Q3/2011) demonstrating benefits of staffing changes, including staff redeployment to dedicated elevator maintenance teams by geographic regions and the addition of more elevator mechanics.
- Reductions in unscheduled maintenance enabled Metro to increase scheduled maintenance without adversely impacting customers. Scheduled elevator modernizations at Bethesda and Capitol South stations accounted for 53% of out-of-service hours in Q3/2012 (there were no modernizations in Q3/2011).

### Elevator System Availability



**Actions to Improve Performance**

- Continue modernizations of two elevators at the Bethesda station, complete two elevators at the Capitol South station and begin modernization of an elevator at the Eastern Market station.
- Engineers will identify structural issues caused by previous water intrusion into elevators and determine necessary actions to correct problems.
- Hire additional mechanics (FY13 Budget Initiative) to improve elevator maintenance.
- Enhance wmata.com Trip Planner to notify customers of elevator outages at stations.

**Conclusion:** Elevator availability in Q3/2012 was significantly better than Q3/2011 as a result of better preventive maintenance practices, preventing water from entering elevators and redeploying/adding mechanics.

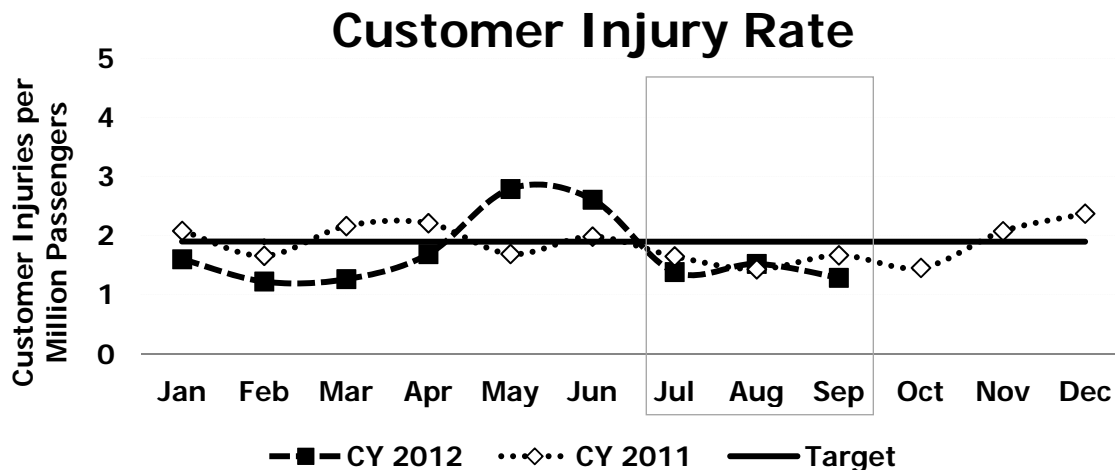
**KPI: Customer Injury Rate (Jul - Sep) Per Million Passengers**

**Objective 1.1 Improve Customer and Employee Safety and Security**

**Reason to Track:** Customer safety is the highest priority for Metro and a key measure of quality service. Customers expect a safe and reliable ride each day. The customer injury rate is an indicator of how well the service is meeting this safety objective. For this measure lower is better.

**Why Did Performance Change?**

- Customers were injured 11% less frequently this quarter compared to Q3/2011 with a rate of only 1.4 injuries per million which is also notably better than the target of 1.9 customer injuries per million.
- Customers were primarily injured while: riding on a bus, walking or running in a rail station, or utilizing an escalator. Injuries were generally related to Slips/Trips/Falls or a Bus-related collision.
- Although bus customer injuries represent a significant portion of the total customer injuries, bus customer injuries declined substantially toward the end of the quarter due to the decrease in collisions. Many actions have taken place to reduce bus collisions, but two initiatives have been a key focus to reducing bus collisions and injuries: the Hot Spots and "Keep It Green" DriveCam initiative.
- Hot Spots (a location where frequent bus accidents occur) are analyzed according to: hour of day, day during the week, frequency, and location and forwarded to each bus garage, as well as the Safety department (SAFE) to create a plan of action.
- The "Keep It Green" DriveCam campaign (a campaign to not trigger a red warning light on board the bus on the monitoring device which monitors risky driving behavior) has also helped to improve the driving behavior of bus operators. For example, the number of buses cited for traffic signal violations declined this quarter.
- SAFE inspected over 100 escalators and rail stations (where Slips/Trips/Falls commonly occur) to focus on any area which may cause a customer to be injured.
- Safety communication messages were a large focus this quarter that encouraged customers to remain alert while using transit.



**Actions to Improve Performance**

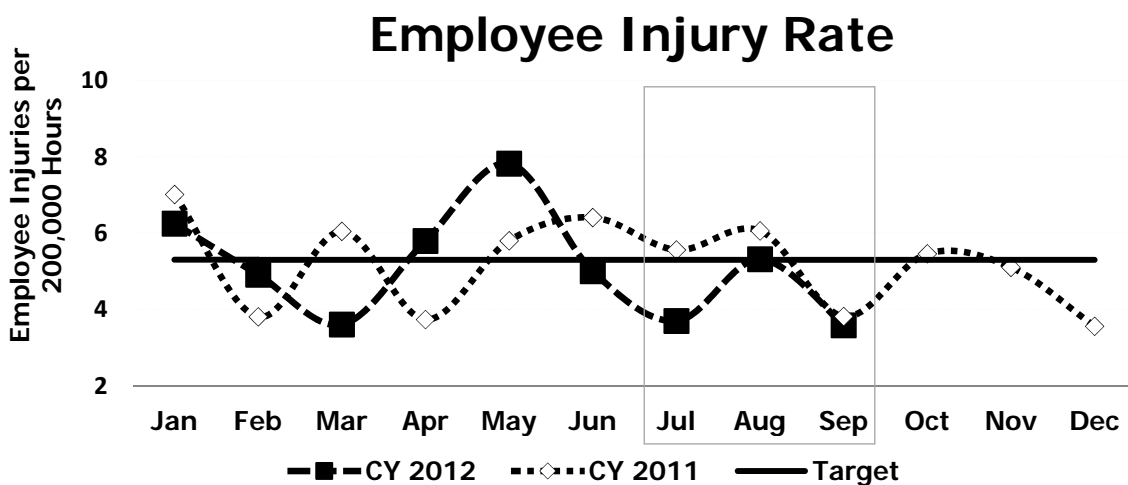
- Conduct passenger service assessments to evaluate and provide safety oriented coaching opportunities for bus operators.
- Incorporate a module in the new We C.A.R.E (Customers Are the Reason we Exist) customer service training material that encourages Operators to ask, for example wheelchair users if they need assistance securing their wheel chair.
- Launch communication campaign to strengthen the safety culture for customers using various communication channels.
- Continue to develop literature on safety hazards/alerts and lessons learned to avoid recurring incidents.

**Conclusion:** Customers were injured 11% less frequently this quarter compared to Q3/2011.

**Reason to Track:** Worker's compensation claims are a key indicator of how safe employees are in the workplace. For this measure lower is better.

**Why Did Performance Change?**

- The Employee Injury rate for Q3/2012 is 20% better than Q3/2011.
- The primary types of injuries that occurred this quarter were Struck by/Against, Slips/Trips/Falls, and Collision-related injuries. Struck by/Against injuries occur when an employee strikes a body part against an object (e.g., door, gate, or equipment).
- Based on preliminary reviews of injury reports, the leading cause of injuries were driven by employees becoming distracted, pre-occupied or unfocused on their surroundings and not following prescribed task procedures.
- Bus operators and mechanics in various trades were the top two employee groups reporting injuries. Bus operator injuries were typically caused by straining or by collisions; these injury types decreased when compared to Q3/2011. Risky driving behavior continued to be monitored and coached using DriveCam, now in its second year. The Safety Department has also partnered with Bus Training to develop ergonomic stretches and lifting techniques for Operators.
- Safety changes were implemented in the rail yard car wash areas to include new signage and safety chains which limit access to platform wash areas.



**Actions to Improve Performance**

- Bus will launch the WE CARE (Customers Are the Reason we Exist) training program to include an employee wellness module, understanding the motto of first taking care of one's self to properly service others.
- SAFE will continue to thoroughly review injuries to improve the quality assurance/check procedures to better understand and address employee injuries.
- SAFE is developing and implementing an SMS training workshop that focuses on improving incident investigations which will expand root cause analysis and sustainable corrective actions.

**Conclusion:** The Employee Injury Rate for Q3/2012 is 18% better than Q3/2011. The primary injuries that occurred this quarter were Struck by/Against, Slips/Trips/Falls, and Collision-related injuries. Metro will continue to evaluate and implement training methods and other outreach initiatives to reduce employee injuries.

**KPI: Crime Rate (Jun - Aug) Per Million Passengers**

**Objective 1.1 Improve Customer and Employee Safety and Security**

**Reason to Track:** This measure provides an indication of the perception of safety and security customers experience when traveling the Metro system. Increases or decreases in crime statistics can have a direct effect on whether customers feel safe in the system. For this measure lower is better.

**Why Did Performance Change?**

- The number of serious crimes was down 5% for the three month period (June-August) compared to last year and on track to be at or below the target of <2,050 for 2012.
- The parking crime rate showed significant improvement, down 40% compared to the same three months in 2011. MTPD continued to apply pressure to would-be car thieves, using a variety of tactics including: focusing patrols where vehicle thefts were concentrated in partnership with jurisdictional law enforcement, using observation towers to deter criminals and officers sharing crime prevention tips with customers during peak commuting times and through direct mail contact (when customers left valuables in plain sight).
- The bus crime rate was slightly above 2011 levels, but remained below 1 crime per million riders. Officers continued to focus on the highest crime routes. For example, particular attention was paid to the D12, identified as a high crime route in July, with the result of no crime occurring on that route in the 2nd half of the month.
- The rail crime rate was higher than 2011, driven by an increase in thefts of small electronic devices (snatches/pickpockets up 31%). MTPD deployed officers to the highest crime stations, with emphasis on stations that youths use during the summer months.



**Target:** Less than 2,050 Part I Crimes in CY 2012

**Actions to Improve Performance**

- As school resumes, re-establish regular communication with school administrators and redeploy officers to stations and bus routes that serve students in order to reduce youth disorder.
- Conduct Meet and Greets in stations in order to hear directly from customers about security concerns and provide crime prevention information to customers (e.g., tips on avoiding small electronic device theft, how to properly secure bicycles).
- Visit rail stations, government agencies, area schools and Metro maintenance facilities to familiarize riders and employees about emergency preparedness as part of National Preparedness Month.

**Conclusion:** Serious crime in June-August 2012 was 5% below 2011, led by significant improvements in the parking crime rate as MTPD used a variety of tactics to reduce vehicle thefts. The bus and rail crime rates were higher than last year, with rail increasing due to an uptick in small electronic device thefts.



**KPI: Customer Comment Rate (Jul - Sep)  
Per Million Passengers**

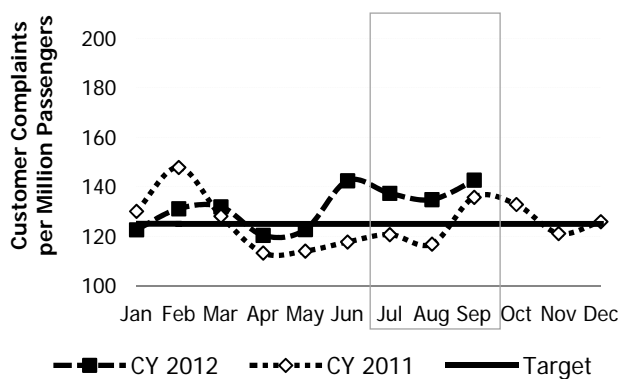
**Objective 2.3 Maximize Rider Satisfaction**

**Reason to Track:** Listening to customer feedback about the quality of service provides a clear roadmap to those areas of the operation where actions to improve the service can best help to maximize rider satisfaction. For the Customer Complaint Rate lower is better. For the Customer Commendation Rate higher is better.

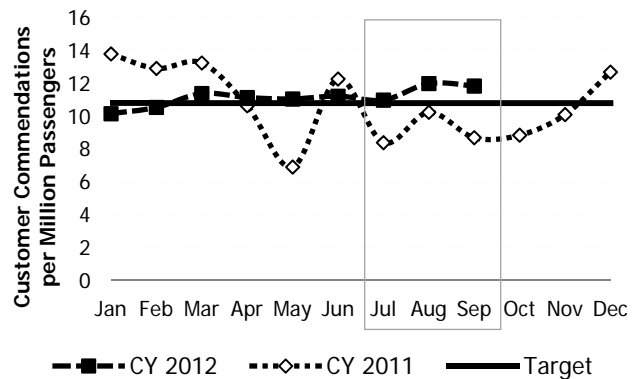
**Why Did Performance Change?**

- The customer commendation rate improved to 12 commendations per million trips for Q3/2012, a 27% increase over Q3/2011. However, the customer complaint rate was 11% worse for the quarter, remaining above target.
- Rail customer complaints decreased by the end of the quarter from a high in July, as customers adjusted to the new rail schedule. The rail complaint rate was 21% higher for Q3/2012 compared with last year. Commendations for rail were up from last year by 13% due to efforts to improve communication with customers in the rail system.
- Bus complaints, which continued to track higher than last year (10% for Q3), were predominantly in the categories of failure to service stop and no-shows (37% of total). These complaints reflect customer and operator unfamiliarity with schedules, and more operators on new routes as a new bus division opened and changes were made to increase schedule reliability. Bus commendations were up slightly (4% for Q3 2012) compared to last year, due to an increase in commendations about courteous and professional service. Operators were cited for providing information in a patient and professional manner, and going the extra mile in assisting customers.
- MetroAccess saw its complaint rate decrease by 3% compared to the same quarter in 2011. Fifty-eight percent of MetroAccess complaints were in the categories of early/late trips, on-board travel time, and no-show/failure to wait, which are closely tied to the management of on-time performance. Complaints about drivers dropped to 7% of total complaints, down from 12% during the same quarter last year, reflecting improved driver training and performance. Meanwhile, MetroAccess commendations were up 58% from last year, due to improved communications with customers about their service.

**Customer Complaint Rate**



**Customer Commendation Rate**



**Actions to Improve Performance**

- Provide opportunities for customers to learn about Metrobus service changes and to provide input into bus service improvements. Continue to emphasize customer service training for Bus Operators.
- Provide training for Metrorail Station Managers to improve communication with customers about service changes, use of fare equipment and how to navigate the Metro system.
- Continue to update the public on Metro's rebuilding efforts through the MetroForward website.

**Conclusion:** Third quarter complaints are higher than last year due to bus and rail schedule changes. Customer commendations were above target due to efforts to improve communications with customers.

## Vital Signs Report

### Definitions for Key Performance Indicators

---

**Bus On-Time Performance** – Metrobus adherence to scheduled service.

**Calculation:** For delivered trips, difference between scheduled time and actual time arriving at a time point based on a window of no more than 2 minutes early or 7 minutes late. Sample size of observed time points varies by route.

**Bus Fleet Reliability (Bus Mean Distance between Failures)** – The number of total miles traveled before a mechanical breakdown. A failure is an event that requires the bus to be removed from service or deviate from the schedule.

**Calculation:** Total Bus Miles / Number of failures.

**Rail On-Time Performance by Line** – Rail on-time performance is measured by line during weekday peak and off-peak periods. During peak service (AM/PM), station stops made within the scheduled headway plus two minutes are considered on-time. During non-peak (mid-day and late night), station stops made within the scheduled headway plus no more than 50% of the scheduled headway are considered on-time.

**Calculation:** Number of Metrorail station stops made up to the scheduled headway plus 2 minutes / total Metrorail station stops for peak service. Number of Metrorail station stops made up to 150% of the scheduled headway / total Metrorail station stops for off-peak service.

**Rail Fleet Reliability (Railcar Mean Distance between Delays)** – The number of revenue miles traveled before a railcar failure results in a delay of service of more than three minutes. Some car failures result in inconvenience or discomfort, but do not always result in a delay of service (such as hot cars).

**Calculation:** Total railcar revenue miles / number of failures resulting in delays greater than three minutes.

**MetroAccess On-Time Performance** – The number of trips provided within the on-time pick-up window as a percent of the total trips that were actually dispatched into service (delivered). This includes trips where the vehicle arrived, but the customer was not available to be picked up. Vehicles arriving at the pick-up location after the end of the 30-minute on-time window are considered late. Vehicles arriving more than 30 minutes after the end of the on-time window are regarded as very late.

**Calculation:** Number of vehicle arrivals at the pick-up location within the 30-minute on-time window / the total number of trips delivered.

**Elevator and Escalator System Availability** – Percentage of time that Metrorail escalators or elevators in stations and parking garages are in service during operating hours.

**Calculation:** Hours in service / operating hours. Hours in service = operating hours – hours out of service. Operating hours = operating hours per unit \* number of units.

**Customer Injury Rate (per million passengers<sup>1</sup>)** – Injury to any customer caused by some aspect of Metro's operation that requires immediate medical attention away from the scene of the injury.

**Calculation:** Number of injuries / (number of passengers / 1,000,000).

**Employee Injury Rate (per 200,000 hours)** – An employee injury is recorded when the injury is (a) work related; and, (b) one or more of the following happens to the employee: 1) receives medical treatment above first aid, 2) loses consciousness, 3) takes off days away from work, 4) is restricted in their ability to do their job, 5) is transferred to another job, 6) death.

**Calculation:** Number of injuries / (total work hours / 200,000).

**Crime Rate (per million passengers<sup>1</sup>)** – Part I crimes reported to Metro Transit Police Department for Metrobus (on buses), Metrorail (on trains and in rail stations), or at Metro parking lots in relation to Metro's monthly passenger trips. Reported by Metrobus, Metrorail, and Metro parking lots.

**Calculation:** Number of crimes / (number of passengers / 1,000,000).

**Customer Comment Rate (per million passengers<sup>1</sup>)** – A complaint is defined as any phone call, e-mail or letter resulting in investigation and response to a customer. This measure includes the subject of fare policy but excludes specific Smarttrip matters handled through the regional customer service center. A commendation is any form of complimentary information received regarding the delivery of Metro service.

**Calculation:** Number of complaints or commendations / (number of passengers / 1,000,000).

<sup>1</sup> Passengers are defined as follows:

- Metrobus reports unlinked passenger trips. An unlinked trip is counted every time a customer boards a Metrobus. In an example where a customer transfers between two Metrobuses to complete their travel two trips are counted.
- Metrorail reports linked passenger trips. A linked trip is counted every time a customer enters through a faregate. In an example where a customer transfers between two trains to complete their travel one trip is counted.
- MetroAccess reports completed passenger trips. A fare paying passenger traveling from an origin to a destination is counted as one passenger trip.

**Vital Signs Report  
Performance Data**

**3rd Quarter 2012**

**KPI: Bus On-Time Performance -- Target = 78%**

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	78.5%	76.9%	77.5%	76.2%	74.5%	74.0%	75.5%	76.4%	72.2%	72.6%	73.7%	75.2%	74.7%
CY 2012	78.3%	77.8%	76.4%	77.2%	74.8%	74.9%	76.7%	78.0%	73.8%				76.2%

**KPI: Bus Fleet Reliability (Bus Mean Distance Between Failures) -- Target = 7,700 Miles**

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	8,681	8,144	7,794	7,171	7,277	6,916	6,312	6,651	6,206	7,727	6,649	7,766	6,390
CY 2012	8,704	8,230	8,527	8,330	7,302	7,378	7,045	8,389	6,999				7,478

**Bus Fleet Reliability (Bus Mean Distance Between Failure by Fleet Type)**

Type (% of Fleet)	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	June	Jul	Aug	Sept	Q3 Jul - Sep
CNG (30%)	8,066	7,625	8,246	8,205	8,102	7,184	8,058	6,036	6,493	7,788	8,402	8,147	8,110
Hybrid (27%)	8,792	8,346	12,249	11,371	11,180	12,681	11,172	12,000	11,451	9,293	10,890	8,691	9,577
Clean Diesel (8%)	10,168	5,872	6,852	11,951	8,232	9,897	7,712	6,527	7,027	5,728	7,162	4,543	5,653
All Other (35%)	6,066	4,834	5,066	6,197	5,678	5,973	5,843	4,867	4,604	4,080	5,468	4,950	4,781

**KPI: Rail On-Time Performance -- Target = >90%**

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	87.9%	88.7%	91.0%	90.9%	90.9%	90.2%	89.5%	91.4%	91.0%	90.5%	88.7%	90.6%	90.7%
CY 2012	89.3%	89.2%	90.8%	90.8%	90.0%	90.8%	91.2%	92.1%	91.5%				91.7%

In June 2012, the Rail OTP calculation was adjusted to reflect Rush+. To allow for comparison with past performance, OTP was recalculated for Jan 2011-May 2012.

**Rail On-Time Performance by Line**

	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	12-Month OTP
Red Line	89.3%	88.8%	89.5%	85.8%	85.6%	90.7%	90.7%	88.8%	88.7%	90.1%	91.4%	90.0%	89.2%
Blue Line	90.5%	87.7%	91.2%	90.3%	90.5%	89.8%	89.6%	89.4%	90.3%	90.3%	91.0%	91.0%	90.1%
Orange Line	92.0%	90.3%	92.4%	91.8%	92.0%	91.0%	90.9%	90.7%	92.1%	92.3%	93.1%	92.9%	91.8%
Green Line	91.5%	86.5%	90.7%	91.7%	90.7%	92.4%	92.9%	92.1%	93.6%	93.1%	93.8%	93.4%	91.9%
Yellow Line	91.1%	86.7%	91.0%	90.6%	89.7%	91.8%	92.3%	91.6%	92.0%	91.7%	92.3%	92.5%	91.2%
Average (All Lines)	90.5%	88.7%	90.6%	89.3%	89.2%	90.8%	90.8%	90.0%	90.8%	91.2%	92.1%	91.5%	90.5%

Vital Signs Report  
Performance Data (cont.)

3rd Quarter 2012

KPI: Rail Fleet Reliability (Rail Mean Distance Between Delays by Railcar Series) -- Target = 60,000 miles

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	37,703	48,241	50,328	39,302	37,355	36,963	33,112	42,475	50,829	47,654	35,138	39,356	41,097
CY 2012	40,253	40,399	43,537	42,237	42,556	32,526	36,551	50,842	51,013				45,119

KPI: Rail Fleet Reliability (Rail Mean Distance Between Delays by Railcar Series) -- Target = 60,000 miles

	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Q3 MDBD
1000 series railcars	56,142	32,581	62,224	47,930	47,408	46,781	43,959	40,101	33,340	32,553	44,896	39,974	38,621
2000/3000 series railcars	37,194	27,023	26,800	29,179	30,131	32,197	40,684	38,857	28,427	39,288	66,778	72,089	55,691
4000 series railcars	30,147	26,240	21,426	25,538	34,345	22,688	39,637	30,161	22,223	20,298	25,057	17,755	20,810
5000 series railcars	75,724	58,799	56,294	51,995	43,848	65,551	41,368	48,665	33,858	32,177	50,368	64,295	45,378
6000 series railcars	68,429	60,631	74,084	77,198	64,069	93,097	44,747	58,788	51,617	64,260	58,564	79,559	65,847
Fleet average	47,654	35,135	39,356	40,253	40,399	43,537	42,237	42,556	32,526	36,551	50,842	51,013	45,119

KPI: MetroAccess On-time Performance -- Target = 92%

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	90.1%	89.0%	91.3%	91.2%	92.2%	93.2%	93.1%	92.7%	91.8%	93.0%	93.0%	93.1%	92.6%
CY 2012	93.4%	92.3%	91.7%	92.8%	92.4%	92.7%	93.6%	92.5%	92.1%				92.7%

KPI: Escalator System Availability -- Target = 89%

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	88.8%	86.6%	86.9%	86.2%	82.5%	82.0%	81.9%	80.7%	84.4%	87.4%	90.1%	88.6%	82.4%
CY 2012	88.6%	89.4%	89.3%	90.0%	90.7%	90.6%	89.9%	87.6%	86.8%				88.1%

KPI: Elevator System Availability -- Target = 97.5%

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	96.3%	96.0%	96.9%	96.4%	97.4%	98.0%	97.3%	95.2%	94.5%	94.9%	96.7%	96.4%	95.7%
CY 2012	95.7%	96.6%	96.5%	96.5%	97.3%	98.0%	97.0%	97.5%	97.2%				97.2%

**Vital Signs Report**  
**Performance Data (cont.)**

**3rd Quarter 2012**

**KPI: Customer Injury Rate (per million passengers)\* -- Target = < 1.9 injuries per million passengers**

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	2.08	1.66	2.16	2.21	1.69	1.99	1.65	1.43	1.67	1.46	2.08	2.37	1.58
CY 2012	1.60	1.23	1.27	1.69	2.79	2.61	1.39	1.52	1.29				1.40

\*Includes Metrobus, Metrorail, rail transit facilities (stations, escalators and parking facilities) and MetroAccess customer injuries

**Bus Customer Injury Rate (per million passengers)\***

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	1.72	0.93	3.38	2.59	2.01	3.34	1.88	1.32	2.69	1.75	3.02	3.86	1.96
CY 2012	1.58	1.28	1.11	2.81	4.49	4.18	1.43	1.70	1.16				1.44

\*Includes Shuttle Bus Trips in CY 2012 only.

**Rail Customer Injury Rate (per million passengers)**

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	0.13	0.19	0.15	0.10	0.16	0.20	0.05	0.05	0.00	0.11	0.23	0.12	0.04
CY 2012	0.00	0.00	0.05	0.11	0.16	0.05	0.05	0.05	0.12				0.07

**Rail Transit Facilities Occupant Injury Rate (per million passengers)\***

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	2.00	1.82	1.17	1.61	1.08	0.90	1.03	1.25	0.94	0.87	1.11	1.16	1.29
CY 2012	1.57	1.08	1.22	0.84	1.57	1.54	1.06	0.93	1.20				1.23

\*Includes station, escalator and parking facility customer injuries.

**KPI: MetroAccess Customer Injury Rate (per million passengers)**

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	16.45	10.55	14.63	32.12	27.41	16.72	53.96	22.53	11.65	34.54	17.60	17.70	29.08
CY 2012	5.92	11.69	10.83	11.47	5.48	17.45	30.40	45.07	6.18				27.79

**KPI: Employee Injury Rate (per 200,000 hours) -- Target = < 5.3 injuries per 200,000 hours**

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	7.01	3.81	6.05	3.74	5.80	6.41	5.56	6.06	3.82	5.46	5.10	3.56	5.19
CY 2012	6.25	4.91	3.61	5.80	7.82	5.00	3.70	5.32	3.59				4.17

\* Claims reconciled to reflect late reports and claims denied, effective February, 2012.

Vital Signs Report  
Performance Data (cont.)

3rd Quarter 2012

KPI: Crime Rate (per million passengers) -- Target = < 2,050 Part I Crimes in Calendar Year 2012

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jun - Aug
CY 2011 Metrobus	0.86	0.31	0.95	0.74	0.18	0.45	0.47	0.79	0.80	0.37	0.57	0.77	0.57
CY 2012 Metrobus	1.41	0.93	0.77	1.10	1.57	1.11	0.55	0.77					0.81
CY 2011 Metrorail	6.39	4.68	3.96	4.72	7.32	5.16	6.06	4.02	4.16	5.41	9.03	6.76	5.10
CY 2012 Metrorail	7.99	8.31	5.14	4.79	4.62	6.52	6.13	5.66					6.11
CY 2011 Parking	2.82	2.50	1.78	1.24	1.19	3.50	3.39	3.15	2.66	1.57	1.57	2.25	3.35
CY 2012 Parking	1.64	0.78	1.17	1.32	2.36	1.90	1.85	2.25					2.00

\*Results differ from October 2012 MTPD Security Report to the Board of Directors.

MTPD redefined Crime Rate to remove forty-one CY 12 crimes that were later identified as unfounded (e.g., did not occur on Metro property, reclassified to a less serious Part II crime).

Crimes by Type

	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Avg. Thru Aug.
Robbery	53	68	115	93	43	22	24	22	20	25	28	25	44
Larceny	69	69	66	60	123	130	103	101	101	133	126	126	103
Motor Vehicle Theft	10	4	5	1	6	2	5	5	8	6	4	3	4
Attempted Motor Vehicle Theft	8	2	0	3	3	1	3	0	12	3	2	2	3
Aggravated Assault	6	3	10	11	10	14	8	9	13	11	8	6	9
Rape	0	0	0	0	0	0	0	0	0	0	0	0	-
Burglary	0	1	0	0	0	0	0	0	0	0	0	0	0
Homicide	0	0	0	0	0	0	0	0	0	0	0	0	-
Arson	0	0	0	0	0	0	0	0	0	0	0	0	-
<b>Total</b>	<b>146</b>	<b>147</b>	<b>196</b>	<b>168</b>	<b>185</b>	<b>169</b>	<b>143</b>	<b>137</b>	<b>154</b>	<b>178</b>	<b>168</b>	<b>162</b>	<b>164</b>

\*\*Monthly crime statistics can change as a result of reclassification following formal police investigation.

\*\*\*Beginning in January 2012, snatch and pickpocket crimes are recorded as larcenies in accordance with FBI reporting procedures.

Vital Signs Report  
Performance Data (cont.)

3rd Quarter 2012

KPI: Customer Commendation Rate (per million passengers) -- Target = > 10.8 per million passengers

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	13.8	12.9	13.2	10.6	6.9	12.3	8.4	10.2	8.7	8.8	10.1	12.7	9.1
CY 2012	10.1	10.5	11.4	11.1	11.0	11.2	11.0	12.0	11.8				11.6

KPI: Customer Complaint Rate (per million passengers) -- Target = < 125 complaints per million passengers

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Q3 Jul - Sep
CY 2011	130	148	128	113	114	118	121	117	136	133	121	126	124
CY 2012	123	131	132	120	123	143	137	135	143				138

Metrobus Ridership (millions of unlinked trips)

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Avg. Thru Sep.
CY 2011	9.3	9.7	11.5	10.8	10.9	11.1	10.6	11.4	11.2	10.9	10.6	10.4	10.7
CY 2012	10.8	10.9	11.7	11.0	11.6	10.8	11.0	11.6	10.9				11.2

Metro rail Ridership (millions of linked trips)

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Avg. Thru Sep.
CY 2011	16.0	16.0	19.7	19.3	18.4	20.0	19.5	18.4	18.0	18.5	17.2	16.4	18.4
CY 2012	16.5	16.6	19.7	19.0	19.1	19.5	18.9	18.2	16.6				18.2

MetroAccess Ridership (100,000s of completed trips)

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Avg. Thru Sep.
CY 2011	1.82	1.90	2.05	1.87	1.82	1.79	1.67	1.78	1.72	1.74	1.70	1.69	1.8
CY 2012	1.69	1.71	1.85	1.74	1.83	1.72	1.64	1.77	1.62				1.7

Note: Targets are re-evaluated annually and based on changing operating conditions and performance.



## Metro Facts at a Glance

---

### Metro Service Area

Size	1,500 sq. miles
Population	5 million

### Ridership

Mode	FY 2012	Average Weekday
Bus	132 million	464,982 (September 2012)
Rail	218 million	723,249 (September 2012)
MetroAccess	2.1 million	6,863 (September 2012)
Total	353 million	

### Fiscal Year 2013 Budget

Operating	\$1.6 billion
Capital	\$.9 billion
Total	\$2.5 billion

### Metrobus General Information

Size	11,490 bus stops and 2,398 shelters
Routes*	325
Fiscal Year 2013 Operating Budget	\$565 million
Highest Ridership Route in 2009	30's – Pennsylvania Ave. (16,330 avg. wkdy ridership)
Metrobus Fare	\$1.80 cash, \$1.60 SmarTrip®, Bus-to-bus Transfers Free
Express Bus Fare	\$4.00 cash, \$3.65 SmarTrip®, Airport Fare \$6.00
Bus Fleet*	1,500
Buses in Peak Service	1,262
Bus Fleet by Type*	Compressed Natural Gas (460), Electric Hybrid (593), Clean Diesel (144) and All Other (303)
Average Fleet Age*	6.8 years
Bus Garages	9 – 3 in DC, 3 in MD and 3 in VA

\*As of July 2012.

## Metrorail General Information

Fiscal Year 2013 Operating Budget	\$896 million
Highest Ridership Day	Obama Inauguration on Jan. 20, 2009 (1.1 million)
Busiest Station in 2011	Union Station (760,000 entries in November 2011)
Regular Fare (peak)	Minimum - \$3.10 paper fare card, \$2.10 SmarTrip® Maximum - \$6.75 paper fare card, \$5.75 SmarTrip®
Reduced Fare (non-peak)	Minimum - \$2.70 paper fare card, \$1.70 SmarTrip® Maximum - \$4.50 paper fare card, \$3.50 SmarTrip®
Paper Farecard Surcharge	\$1.00 per trip 50¢ fare surcharge for seniors/people with disabilities
1 <sup>st</sup> Segment Opening/Year	Farragut North-Rhode Island Avenue (1976)
Newest Stations/Year	Morgan Boulevard, New York Avenue, and Largo Town Center (2004)
Rail Cars in Revenue Service	1,104
Rail Cars in Peak Service	896
Rail Cars by Series	1000 Series (288), 2000/3000 (362), 4000 (100), 5000 (184) and 6000 (184)
Lines	5 – Red, Blue, Orange, Green, and Yellow
Station Escalators	588
Station Elevators	239
Longest Escalator	Wheaton station (230 feet)
Deepest Station	Forest Glen (21 stories / 196 feet)
Rail Yards	9 – 1 in DC, 6 in MD and 2 in VA

## MetroAccess General Information

Fiscal Year 2012 Operating Budget	\$115 million
MetroAccess Fare	Within the ADA service area – twice the equivalent SmarTrip-based fare up to a \$7 maximum
Paratransit Vehicle Fleet**	600
Average Fleet Age**	2.8 years
Paratransit Garages	7 (1 in DC, 4 in MD and 2 in VA)
Contract Provider	MV Transportation

\*\*As of December 2011.