MARYLAND DEPARTMENT OF TRANSPORTATION

EXCELLERATOR

Performance Management System

3rd Quarter of CY2018

October 2018

State of Maryland

A Message From the Governor

"Our administration is committed to developing innovative solutions that deliver what Marylanders want – an affordable and reliable transportation system. By implementing a comprehensive program of accountability and continual improvements, we will deliver a better transportation system for the citizens of Maryland."

"This is another step our administration is taking to Change Maryland for the Better!"

– **Larry Hogan**, *Governor*

CHANGING
Maryland
for the Better

The Maryland Department of Transportation and its
Transportation Business Units proudly present the official mission statement.

MARYLAND DEPARTMENT
OF TRANSPORTATION

MISSION STATEMENT

"The Maryland Department of Transportation is a customer-driven leader that delivers safe, sustainable, intelligent, and exceptional transportation solutions in order to connect our customers to life's opportunities."

A Message From the Secretary

My Fellow Marylanders,

Pete K. Rahn
Secretary

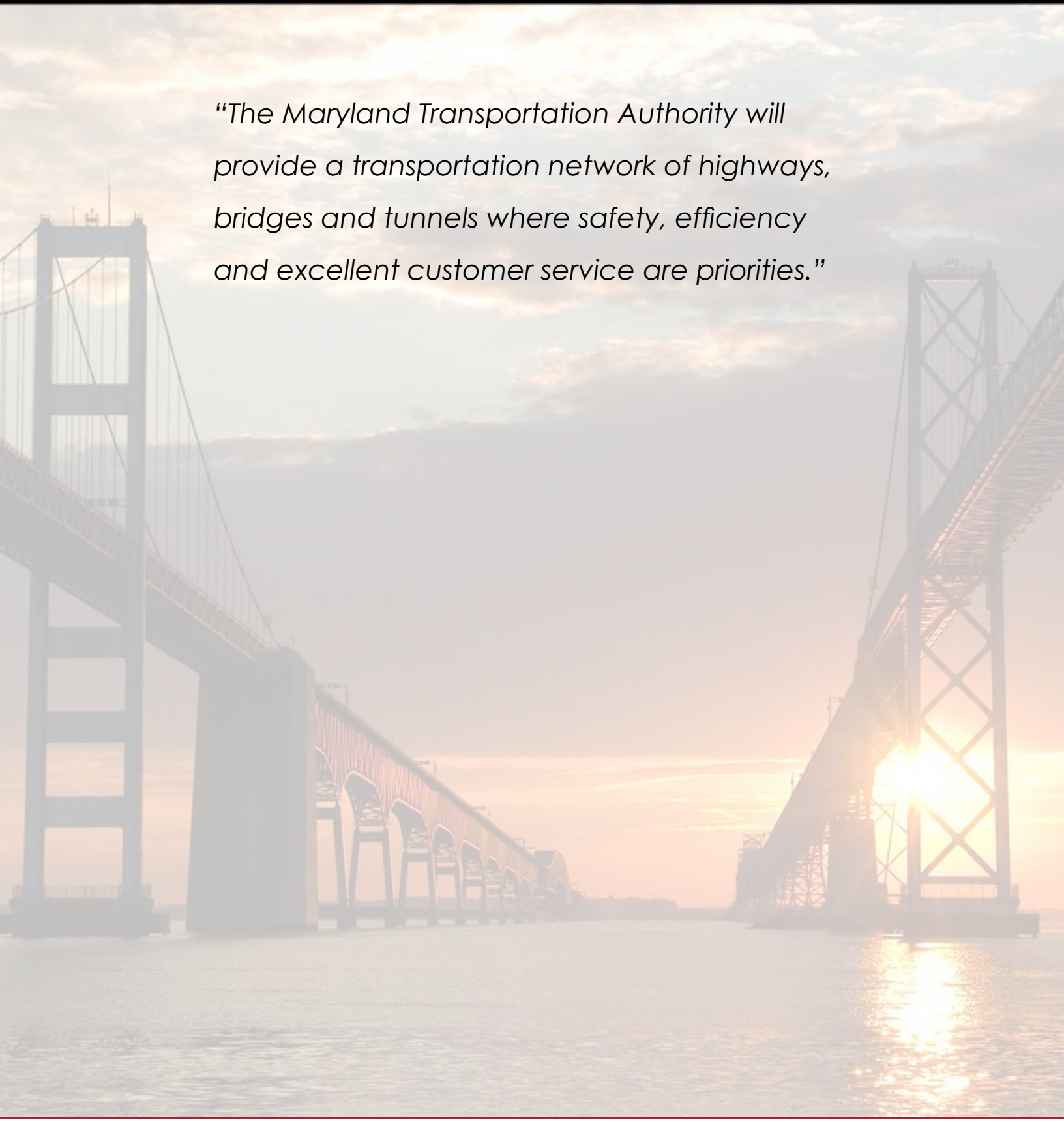
I am proud that the Maryland Department of Transportation Excellerator Performance Management System is in its third year. We have made great strides in developing and implementing performance measures, refining strategies and focusing on delivering results for our customers.

We have created more than 150 individual performance measures that touch every aspect of our business throughout the organization. Whether we are building and maintaining our roads and bridges, running safe and efficient bus and rail systems, operating an international port and airport or improving the vehicle and driver registration process for Marylanders, we stand strong in our commitment and responsibility to deliver the best transportation products and services for our customers.

Every quarter we review our progress and share our results online for public inspection and within the organization through a live stream of our quarterly review meeting. This allows all 10,271 MDOT employees the opportunity to see the impact of the work they do each day and how they contribute to running a safe and secure transportation system.

Most importantly, we are delivering results. As we respond faster to customer inquiries, become increasingly efficient in using our resources wisely and providing a stronger foundation for economic development for the State, we will continue to deliver exceptional customer service and create more value for those who live and travel throughout Maryland.

I invite you to continue to review our MDOT Excellerator program as we continue down the path of constant progress towards outstanding results.



"The Maryland Transportation Authority will provide a transportation network of highways, bridges and tunnels where safety, efficiency and excellent customer service are priorities."

A Message From the Executive Director

Dear Valued Customer,

The Maryland Transportation Authority (MDTA) is working enthusiastically to meet the goals set forth by Governor Hogan and Transportation Secretary Rahn to provide a safe, reliable, and affordable network of tolled highways, bridges and tunnels that support mobility, economic development and job creation. The MDTA also provides law enforcement support to our toll facilities and for MDOT's Port of Baltimore and BWI Marshall Airport. Each of our employees plays a vital role in ensuring that our facilities, which are an essential part of Maryland's transportation network, meet the growing needs of our citizens and visitors who travel them each year. We strive to provide world-class customer service and challenge each of our employees to exceed our customers' expectations in all that they do.

The MDOT Excellerator Performance Management System provides us with valuable measurements of how well we are meeting our customers' needs. This section of the Excellerator program is comprised of MDTA-specific performance measures that drive our daily and long-term business decisions. Achieving these results can only come from the direct and active involvement of our employees in developing, implementing and reviewing strategies to exceed our customers' expectations.

We appreciate the opportunity to be a part of this program, which helps us identify where we are doing well and where we need to improve the way we do business. Using this valuable feedback, we are taking the concrete steps to preserve our infrastructure, ensure solid customer communications, improve safety, increase efficiency and deliver consistently improving results to the citizens we serve.

Kevin C. Reigrut
Executive Director

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Please refer to the MDOT wide Quarterly Performance Management Report for more performance measures for each of the 10 Tangible Results across all of the Transportation Business Units.

Performance Measures Index

Tangible Results		Frequency	Driver
Tangible Result # 1: Provide Exceptional Customer Service			**David K. Greene, MDTA**
MDTA 1.1	Response Time for Messaging Unplanned Events/Crashes	Quarterly	T.J. Bathras, MDTA
Tangible Result #2: Use Resources Wisely			**David K. Greene, MDTA**
MDTA 2.1	MDTA Total Investment Return	Annually (Oct.)	Yaw Berkoh, MDTA
Tangible Result #3: Provide a Safe and Secure Transportation Infrastructure			**David K. Greene, MDTA**
MDTA 3.1	Time of Notification of Unacceptable Guardrail to Return to Service	Quarterly	Serena Liu, MDTA
Tangible Result # 4: Deliver Transportation Solutions and Services of Great Value			**David K. Greene, MDTA**
MDTA 4.1	Video Tolls Per 1,000 Transactions	Quarterly	Sam Walters, MDTA
Tangible Result # 5: Provide An Efficient, Well Connected Transportation Experience			**David K. Greene, MDTA**
MDTA 5.1	Percentage of Customers Paying Video Tolls via MDTA Website	Quarterly	Sam Walters, MDTA
MDTA 5.2	E-ZPass Transactions Per 1,000 Transactions	Quarterly	Sam Walters, MDTA
Tangible Result # 7: Be Fair and Reasonable To Our Partners			**David K. Greene, MDTA**
MDTA 7.1	The number of IFMIS matched payments and validated payments	Quarterly	Lynnea Green, MDTA

TANGIBLE RESULT #1

Provide Exceptional Customer Service

Every MDOT employee is responsible for delivering exceptional customer service by providing customers with respectful, timely and knowledgeable responses to all inquiries and interactions.

RESULT DRIVER:

Leslie Dews

Motor Vehicle Administration (MVA)

TBU COORDINATOR:
David K. Greene
Maryland Transportation Authority (MDTA)

PERFORMANCE MEASURE DRIVER:
T.J. Bathras
Maryland Transportation Authority (MDTA)

PURPOSE OF MEASURE:
To track how quickly the traveling public is alerted to incidents via Dynamic Messaging Signs, and ensure the traveling public is alerted as quickly as possible when there is an incident.

FREQUENCY:
Quarterly

DATA COLLECTION METHODOLOGY:
MDTA and SHA coordinate the data for this measure from the University of Maryland CATT Laboratory. The University of Maryland owns the data that is obtained through the RITIS (Regional Integrated Transportation Information System).

NATIONAL BENCHMARK:
N/A

PERFORMANCE MEASURE MDTA 1.1

Response Time for Messaging Unplanned Events/Crashes

The purpose of this measure is to assess how quickly MDOT notifies the traveling public via Dynamic Messaging Signs (DMS) once there is an unplanned event or incident. Earlier notification alerts the public of an issue and allows the traveler to plan better, whether it is to make arrangements for extra travel time or to plan a different route. Early communication and real-time information will also help keep the traveling public more calm and collected during an incident.

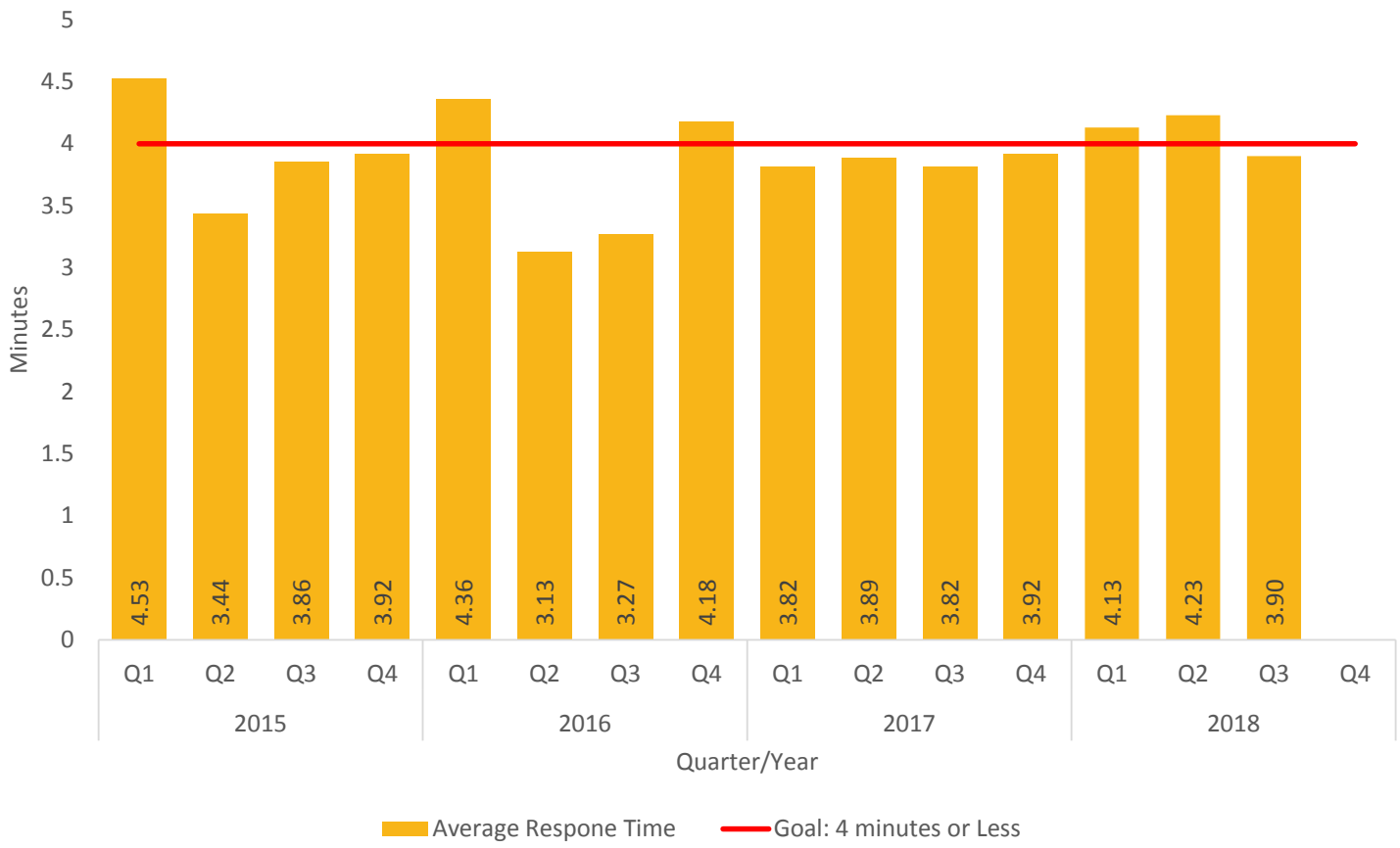
The University of Maryland owns the data and has developed a report for MDTA and SHA that provides the response time.

MDTA and SHA have met to develop a consistent measurement for response time in alerting the public through DMS. The MDTA has streamlined the steps for entering information into "the Coordinated Highways Action Response Team (CHART) Advanced Traffic Management System (ATMS) Program," which contains pre-established DMS plans. The operators use these DMS plans to put the message on the signs as quickly as possible and keep the traveling public alerted.

PERFORMANCE MEASURE MDTA 1.1

Response Time for Messaging Unplanned Events/Crashes

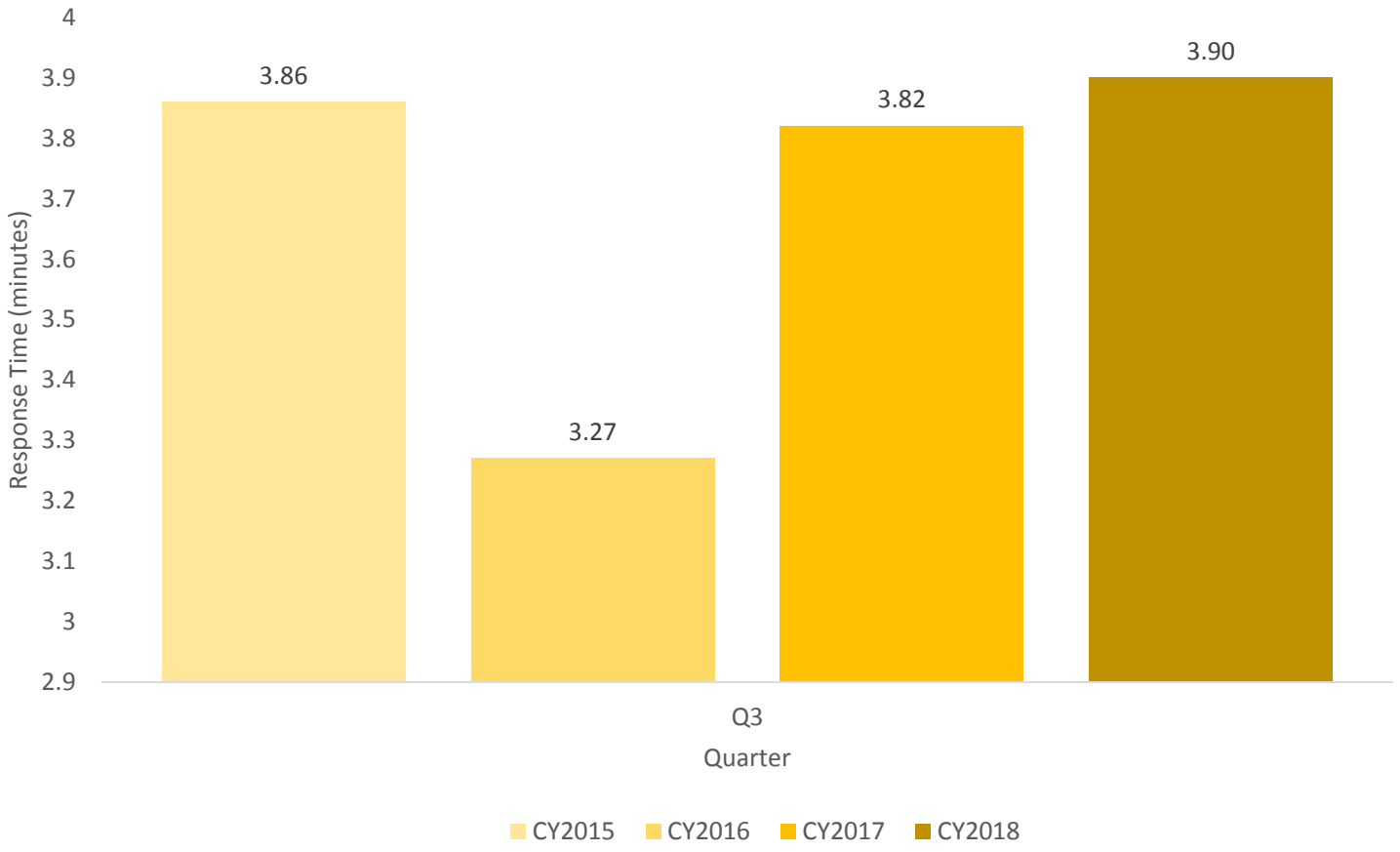
Chart 1.1.1: Average Response Time for Messaging Unplanned Events or Crashes CY2015-CY2018



PERFORMANCE MEASURE MDTA 1.1

Response Time for Messaging Unplanned Events/Crashes

Chart 1.1.2: Average Response Time for Messaging Unplanned Events or Crashes Q3 CY2015-CY2018



TANGIBLE RESULT #2

Use Resources Wisely

MDOT receives resources from customers and they expect products and services in return. To better serve customers, MDOT must maximize the value of every dollar we spend.

RESULT DRIVER:

Corey Stottlemyer
The Secretary's Office (TSO)

TBU COORDINATOR:
David K. Greene
Maryland Transportation Authority (MDTA)

PERFORMANCE MEASURE DRIVER:
Yaw Berkoh
Maryland Transportation Authority (MDTA)

PURPOSE OF MEASURE:
This metric measures results for active investment management versus a more passive approach in a short-term investment alternative.

FREQUENCY:
Annually (October)

DATA COLLECTION METHODOLOGY:
Individual account market values, accrued interest, and external cash flows are used as inputs for the monthly Internal Rate of Return (IRR) calculations that measure time-weighted total return performance.

NATIONAL BENCHMARK:
Maryland Local Government Investment Pool (MLGIP)

PERFORMANCE MEASURE MDTA 2.1
MDTA Total Investment Return

This performance measure examines the total return performance of the Agency's combined investment accounts versus the Maryland Local Government Investment Pool (MLGIP) during a trailing 12-month period. The metric measures results for active investment management versus a more passive approach in a short-term investment alternative. As a proxy for a passive management approach, the MLGIP is not impacted by price volatility associated with interest rate risk related to its short-term maturity profile. It measures total return performance returns on a consolidated basis versus the MLGIP benchmark for various categories of accounts including Debt Service Reserves, Operating and Maintenance Reserves, the General Fund, Debt Service accounts, and Capital accounts.

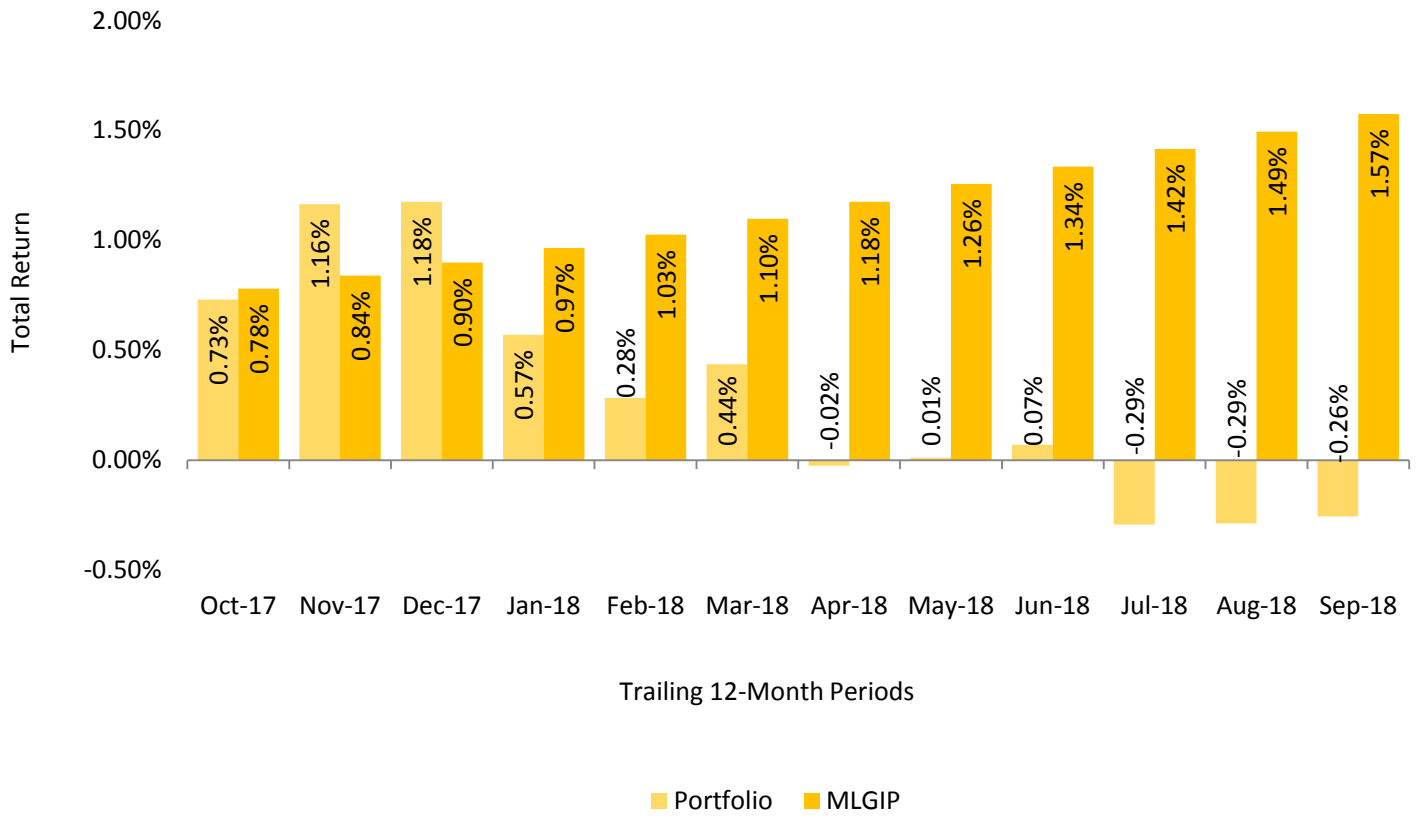
Total return performance is reported monthly to the Maryland Transportation Authority Board relative to various bond market benchmark indices, which are utilized to gauge the relative returns of internal investments and to understand portfolio risk and historical return volatility. The Agency's active approach to investing results in multiple investment strategies for unique types of accounts, including Matched Funding for Debt Service and Capital accounts, as well as total return strategy for certain reserves and unrestricted funds. Total return strategy considers risk/return within the context of return volatility and long-term investment returns on cash. Total return performance measurement helps management optimize the strategy with consideration for the tradeoff between volatility and returns. It also aids in understanding the cost of carry associated with debt, with recognition that investment returns help to offset interest expense and operating costs.

For perspective on long-term historical returns for a longer-term portfolio, a 1-3 year Agency index has outperformed the MLGIP in 21 out of the last 27 years. The average annual outperformance for the 27 years is 1.44 percent.

PERFORMANCE MEASURE MDTA 2.1

MDTA Total Investment Return

Chart 2.1.1: Total MDTA Investment Return Compared to Maryland Local Government Investment Pool Trailing 12-Month Performance FY2017-FY2018



Use Resources Wisely

TANGIBLE RESULT #3

Provide a Safe and Secure Transportation Infrastructure

MDOT will not compromise on a commitment to continually improve the safety and security of customers and partners in everything the Agency does.

RESULT DRIVER:
Sarah Clifford
Maryland Transportation Authority (MDTA)

TBU COORDINATOR:
David K. Greene
Maryland Transportation Authority (MDTA)

PERFORMANCE MEASURE DRIVER:
Serena Liu
Maryland Transportation Authority (MDTA)

PURPOSE OF MEASURE:
To track how quickly the W-Beam Traffic Barrier is repaired after notification.

FREQUENCY:
Quarterly

DATA COLLECTION METHODOLOGY:
MDTA OEC developed a form to track the notification and repair under MR-2847 contract. MR-2847 contract is dedicated for W-Beam Traffic Barrier repair.

NATIONAL BENCHMARK:
N/A

PERFORMANCE MEASURE MDTA 3.1

Time of Notification of Unacceptable Guardrail to Return to Service

The purpose of this measure is to track the time between the notification of unacceptable guardrail and when the repair was performed (return to service). Guardrails, which are roadside safety hardware, are installed throughout MDTA facilities. When a defect (i.e. damage to the beam or end treatment) is identified by MDTA Operation, a notification is sent to MDTA OEC to begin the process of the repair under MR 2847.

Tracking of this item allows MDTA to evaluate the response time for the repairs and identify improvements needed to streamline the process.

The 3rd quarter of 2018, there was a total of 83 new notifications and 103 repairs were made. Of the 103 repairs:

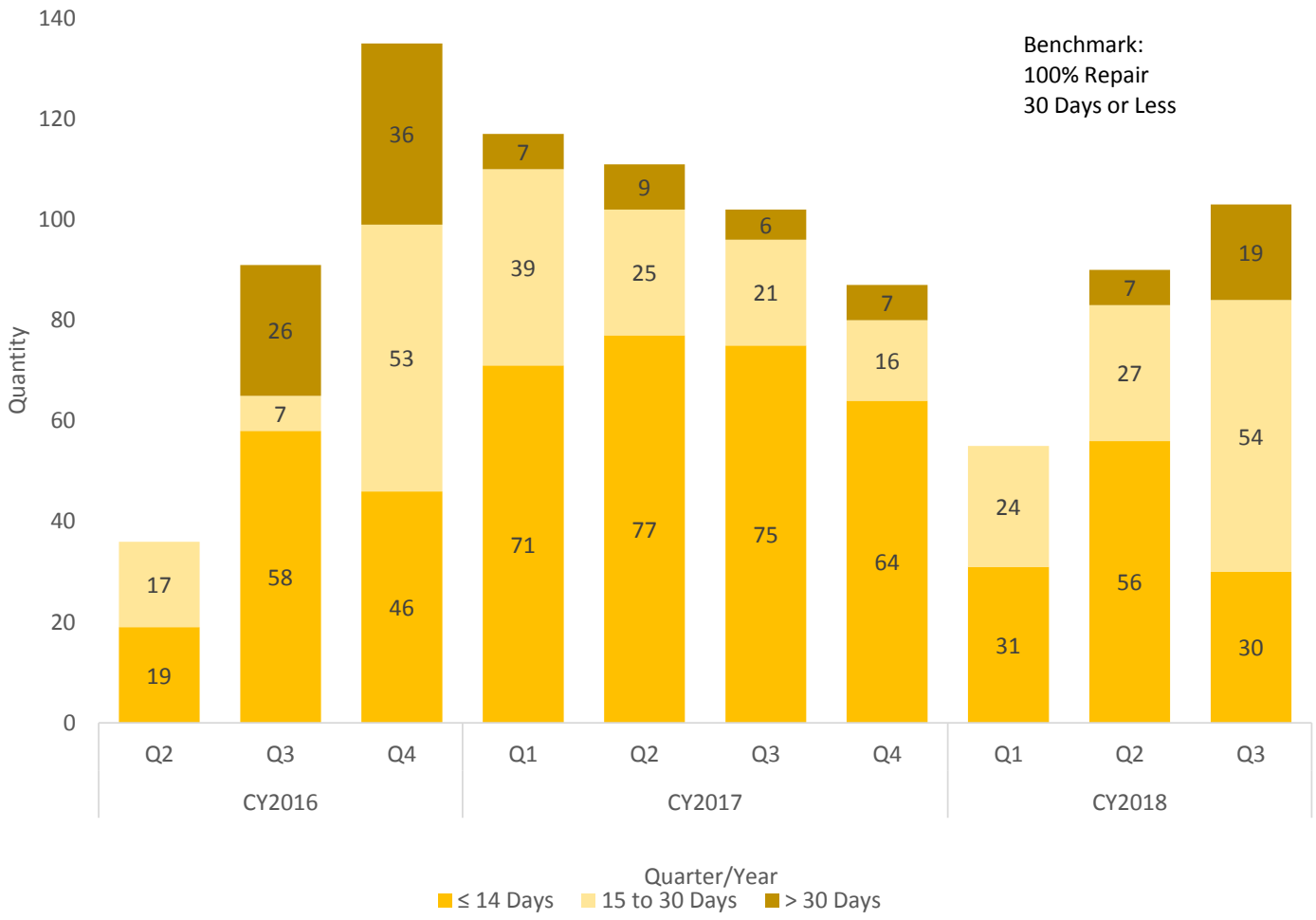
- 30 repairs (29%) were completed within 14 days or less
- 54 repairs (52%) were completed between 15 to 30 days
- 19 repairs (19%) were completed in more than 30 days.

In total, 94 (81%) of the repairs were completed 30 days or less from the notification. Weather events were the main causes of the time delays.

PERFORMANCE MEASURE MDTA 3.1

Time of Notification of Unacceptable Guardrail to Return to Service

Chart 3.1.1: Number of Days between Notification and Repair Q2 CY2016-Q3 CY2018



Provide a Safe and Secure Transportation Infrastructure

TANGIBLE RESULT #4

Deliver Transportation Solutions and Services of Great Value

MDOT will deliver transportation solutions on time and within budget. We will use strategies to ensure that the transportation solution meets the needs of customers and eliminates unnecessary costs.

RESULT DRIVER:
Jason Ridgway
State Highway Administration (SHA)

TBU COORDINATOR:
David K. Greene
Maryland Transportation Authority (MDTA)

PERFORMANCE MEASURE DRIVER:
Sam Walters
Maryland Transportation Authority (MDTA)

PURPOSE OF MEASURE:
To track the number of video toll transactions per 1,000 transactions.

FREQUENCY:
Quarterly

DATA COLLECTION METHODOLOGY:
E-ZPass Ops will collect the data from the database. The number of video tolls are retrieved for the designated period, as well as the total number of tolls for the same period.

NATIONAL BENCHMARK:
32 (weighted benchmark using 40 from Virginia's AET facility and 14 from New Jersey's non-AET facilities as 70% of Maryland video tolls come from Maryland AET facilities and 30% non-AET or 70% of 40 = 28 and 30% of 14 = 4.2, 28 + 4.2 = 32.2)

PERFORMANCE MEASURE MDTA 4.1
Video Tolls Per 1,000 Transactions

Video Tolls are more costly to the public, as significant discounts are offered for E-ZPass usage and frequent commuters.

Video is the most expensive method of collection for MDTA and we only collect a percentage of what is actually billed.

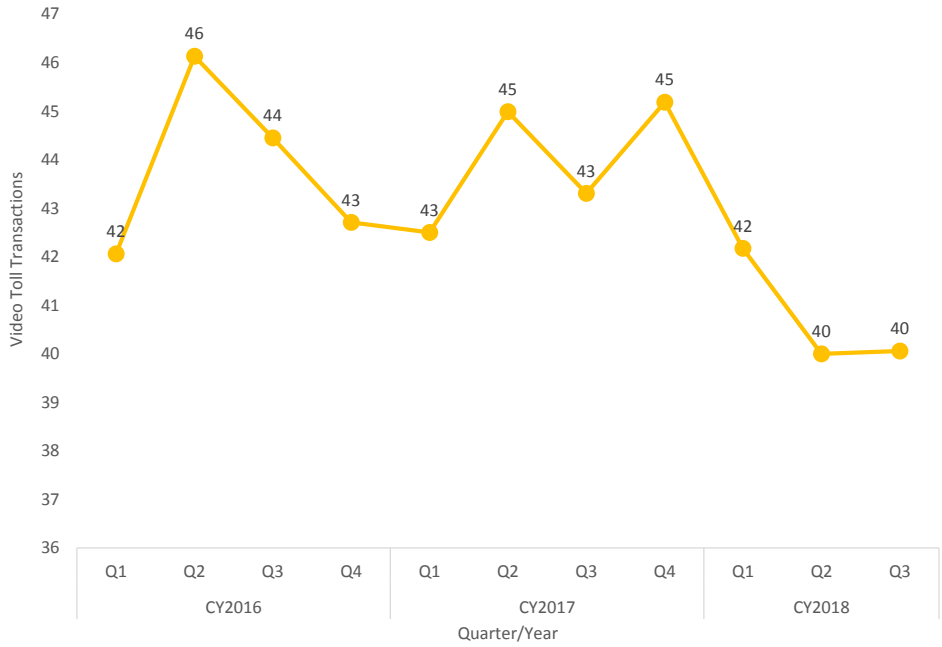
A decrease in this measure will allow MDTA to pass the cost savings back to our customers.

Currently we are trending in the right direction as our measure has decreased since last quarter.

As of Q3 CY2017 we are at 43 video tolls per 1000 transactions. This is down 3 for the same period Q3 CY2018

We continue to market the benefits of E-ZPass and disadvantages of Video Tolling. We are also promoting the use of E-ZPass when assisting customers referred to MVA or Central Collection Unit.

Chart 4.1.1: Number of Video Toll Transactions per 1,000 Transactions Q1 CY2016-Q3 CY2018



TANGIBLE RESULT #5

Provide an Efficient, Well-Connected Transportation Experience

MDOT will provide an easy, reliable transportation experience throughout the system. This includes good connections and world class transportation facilities and services.

RESULT DRIVER:
Phil Sullivan
Maryland Transit Administration (MTA)

TBU COORDINATOR:
David K. Greene
Maryland Transportation Authority (MDTA)

PERFORMANCE MEASURE DRIVER:
Sam Walters
Maryland Transportation Authority (MDTA)

PURPOSE OF MEASURE:
To track the number or percentage of customers using the MDTA website as an option to pay their Notice of Toll Due (NOTD).

FREQUENCY:
Quarterly

DATA COLLECTION METHODOLOGY:
Data is collected by E-ZPass Ops from the database. Payments made on the web will be compared to total payments made for the period.

NATIONAL BENCHMARK:
63% - Based upon 2015 USPS survey of people paying their bills using the mail (37%).

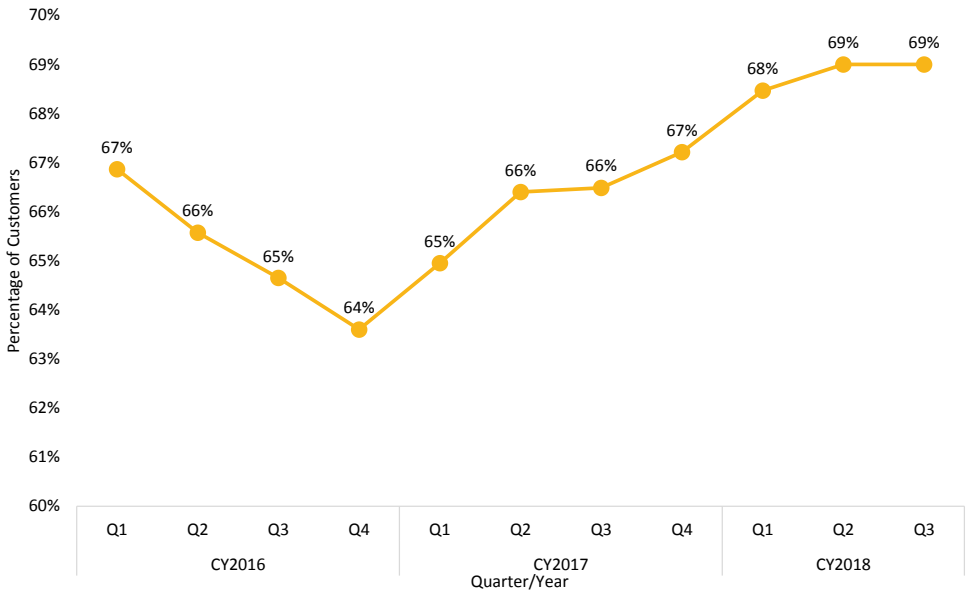
PERFORMANCE MEASURE MDTA 5.1

Percentage of Customers Paying Video Tolls via MDTA Website

Web payment is the most convenient method for our customers. It is available 24/7, does not require waiting in line/phone and saves money by not requiring the purchase of stamps or checks. Web payment is also the most cost-effective method of collection for MDTA as we incur additional expense to support our Customer Service Center, Stop in Centers and processing of cash collection. An increase in this measure will allow MDTA to pass the cost savings back to our customers.

Currently we are trending positively and our measure has increased since the last quarter. As of Q2 CY2018 we are at 69% of payments on the web. This is an increase of 3% from Q2 CY2017. Mobile Web was deployed February 2018 along with a marketing campaign which allows customers to make payment on the website using their mobile devices.

Chart 5.1.1: Percentage of Customers Paying Video Tolls via MDTA Website Q1 CY2016-Q3 CY2018



TBU COORDINATOR:
David K. Greene
Maryland Transportation Authority (MDTA)

PERFORMANCE MEASURE DRIVER:
Sam Walters
Maryland Transportation Authority (MDTA)

PURPOSE OF MEASURE:
To track the penetration of E-ZPass in an effort to more easily move traffic through toll facilities.

FREQUENCY:
Quarterly

DATA COLLECTION METHODOLOGY:
E-ZPass Ops will extract the E-ZPass and total transaction statistics from the database for the period.

NATIONAL BENCHMARK:
800 - Based upon 2015 statistics from New Jersey (794), New York (833), and Pennsylvania (760).

PERFORMANCE MEASURE MDTA 5.2
E-ZPass Transactions Per 1,000 Transactions

E-ZPass Tolls are the least costly to the public, as significant discounts are offered for E-ZPass usage and frequent commuters compared to the base cash or video tolls rates. E-ZPass Tolls are the least expensive method of collection for MDTA and we collect 99.9% of all E-ZPass tolls (Image Rejects, negative balance to -$14.99). An increase in this measure will allow MDTA to pass the cost savings back to our customers.

Currently we are trending positively and our measure has increased over the past year. As of Q2 CY2018 we're at 795 transactions per 1000. This was an increase of 22 from Q2 CY2017. Trends are affected by high video toll volume on the ICC (13%) and cash usage is also cyclical and higher during 1st and 4th quarters.

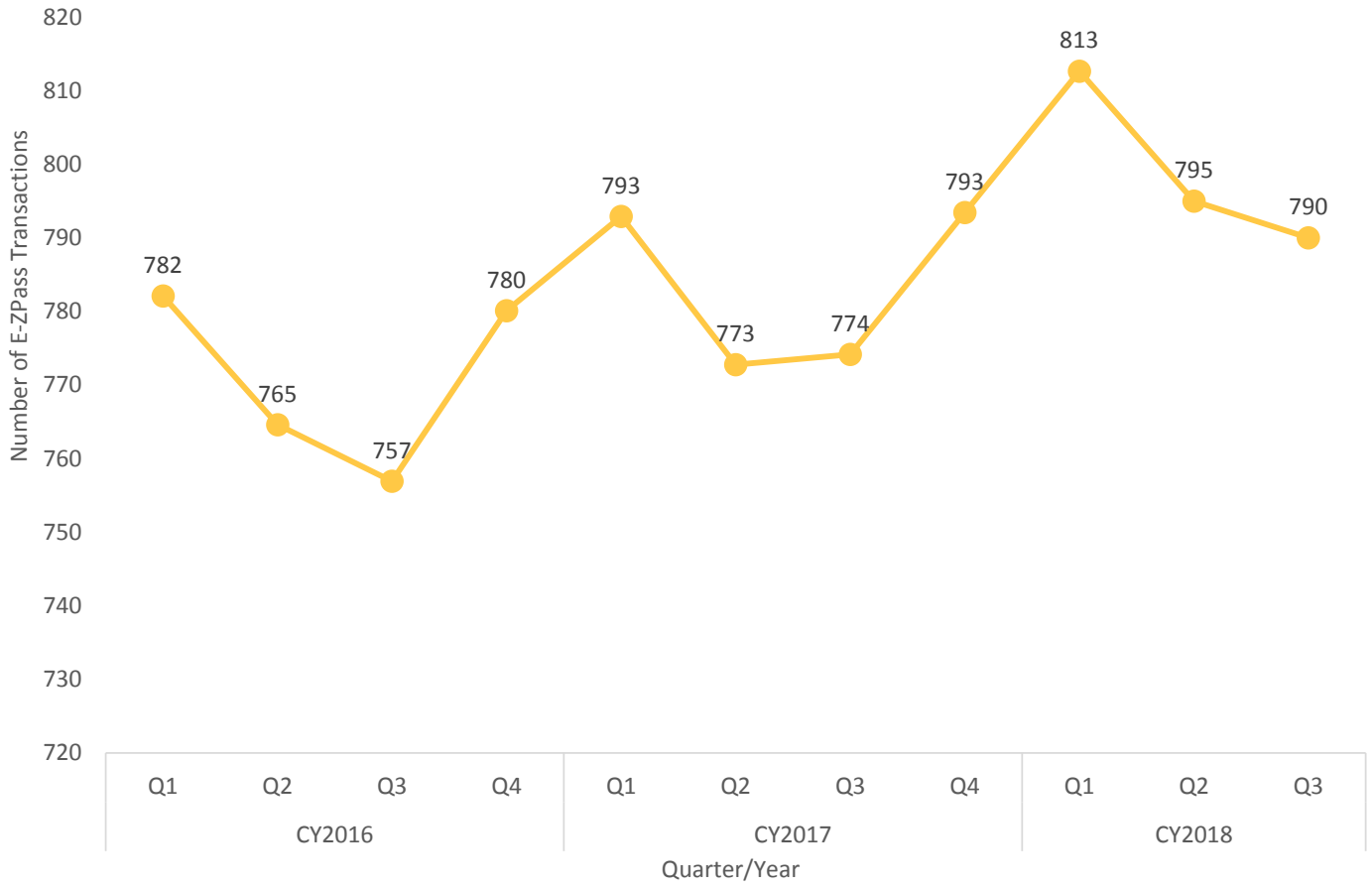
Currently we are marketing the benefits of E-ZPass and disadvantages of Video Tolling and promoting toll discounts, payment convenience and faster passage through toll plazas. We are expanding On The Go Device sales to additional state agencies and retailers and continue to promote a fee free E-ZPass account for Maryland residents.

Email notifications for low and negative balance customers are set to start Q-1 CY2018. Our new waiver guidelines have educational aspects to encourage E-ZPass usage.

PERFORMANCE MEASURE MDTA 5.2

E-ZPass Transactions Per 1,000 Transactions

Chart 5.2.1: Number of E-ZPass Transactions per 1,000 Transactions Q1 CY2016-Q3 CY2018



TANGIBLE RESULT #7

Be Fair and Reasonable to Our Partners

MDOT receives resources from customers and they expect products and services in return. To better serve customers, MDOT must maximize the value of every dollar we spent.

RESULT DRIVER:
Corey Stottlemyer
The Secretary's Office (TSO)

TBU COORDINATOR:
David K. Greene
Maryland Transportation Authority (MDTA)

PERFORMANCE MEASURE DRIVER:
Lynnea Green
Maryland Transportation Authority (MDTA)

PURPOSE OF MEASURE:
To ensure that MBE subcontractors are receiving their payments and that prime contractors are complying with contract requirements.

FREQUENCY:
Quarterly

DATA COLLECTION METHODOLOGY:
Once a payment has been matched with 3 categories (invoice date, check number, and amount paid), a compliance officer will "validate" that payment in iFMIS.

NATIONAL BENCHMARK:
Matching Payments Prime and MBE Sub: 40%

Validation of Payments Prime and MBE Sub: 80%

PERFORMANCE MEASURE MDTA 7.1

The Number of IFMIS Matched Payments and Validated Payments

MBE payments are automatically reviewed by the iFMIS Contractor Compliance and Reporting System (iFMIS), or through manual reconciliation by the compliance officer. A payment is matched when three or more categories are identified with matching information: invoice date, check number, and amount paid. Matched payments are subsequently validated in iFMIS by the compliance officer. Ensuring accurate and timely payment to our prime contractors is important to MDTA because it allows us to offer fair and reasonable service to our partners.

- Matched Payment: A payment that has been matched in the iFMIS system in three or more categories (invoice date, check number, and amount paid).
- Validated Payment: A payment that has been matched in the iFMIS system and reviewed/verified by the compliance officer.
- Reconciling Payments: Reviewing individual payments reported by the MBE subcontractor and prime contractor and determining the category to which the payments should be matched.
- Reconciling Payments Manually: Comparing the total dollars reported as paid to each MBE subcontractor in the prime contractor's report, in the MBE subcontractor's report, and in the MBE database. Identifying any discrepancies reported and recorded.

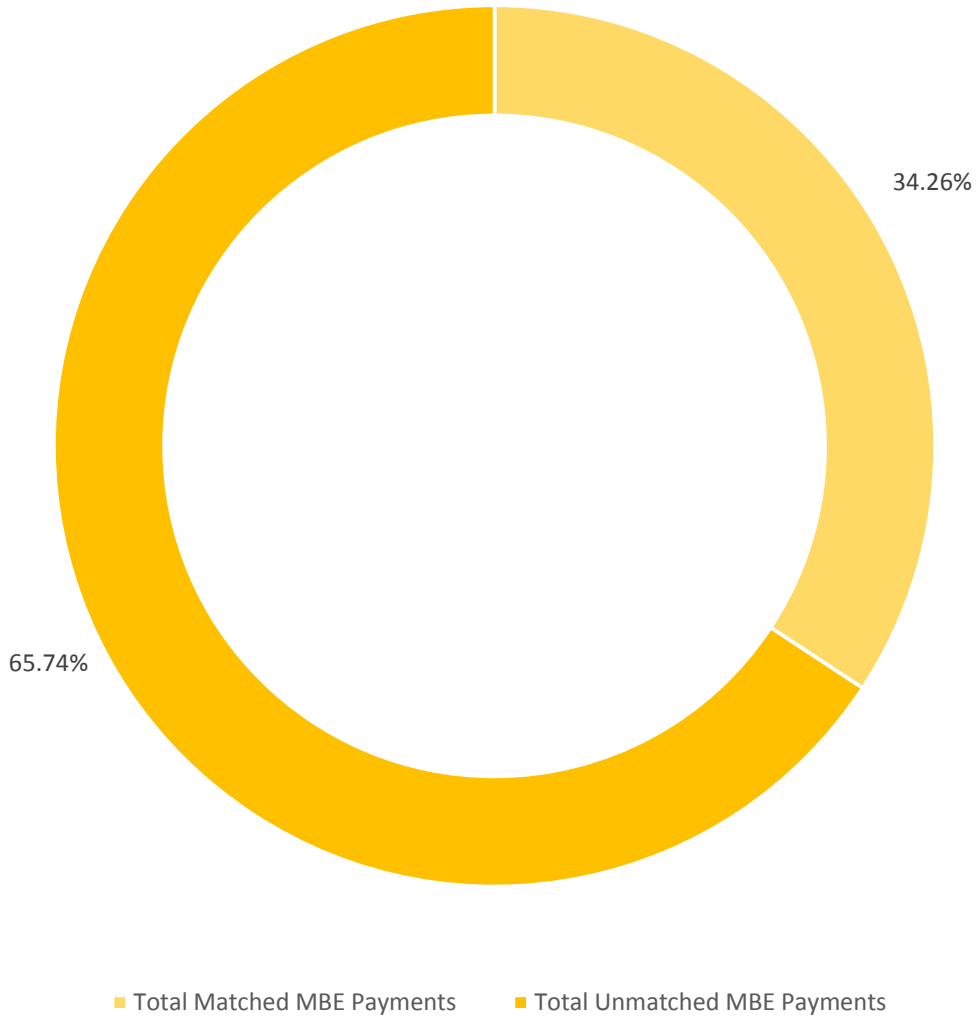
MDTA continues to make progress cleansing data from iFMIS to provide a more accurate reflection of matched and validated payments. MDTA has also implemented internal processes to monitor the compliance officer's actions and ensure greater accountability.

Cumulatively (September 2015 through September 2018), MDTA has 34.26 percent matched payments for prime contractors and 36.51 percent matched payments for MBE subcontractors. For validated payments, MDTA has 95.47 percent payments validated for prime contractors and 96.58 percent payments validated for MBE subcontractors.

PERFORMANCE MEASURE MDTA 7.1

The Number of IFMIS Matched Payments and Validated Payments

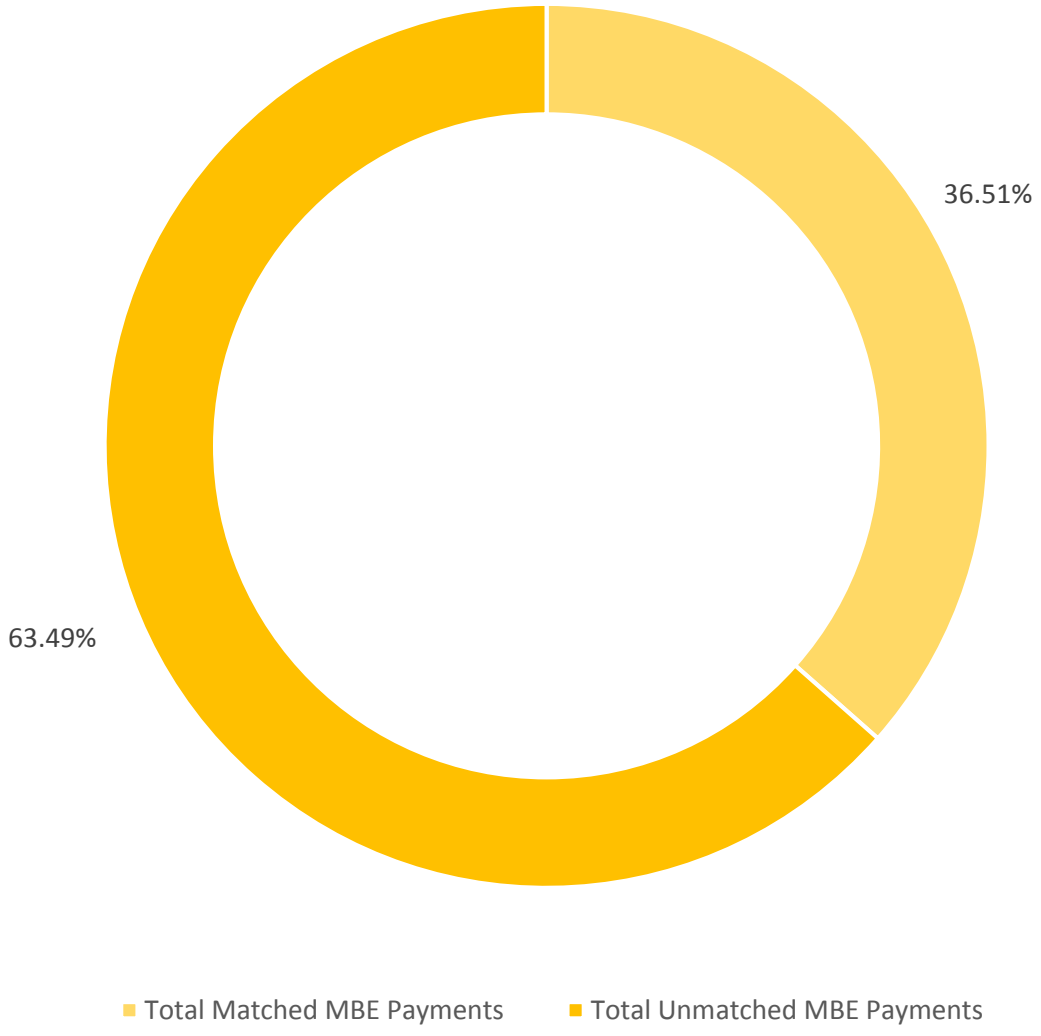
Chart 7.1.1: Prime Matched vs. Unmatched September 2015 - September 2018



PERFORMANCE MEASURE MDTA 7.1

The Number of IFMIS Matched Payments and Validated Payments

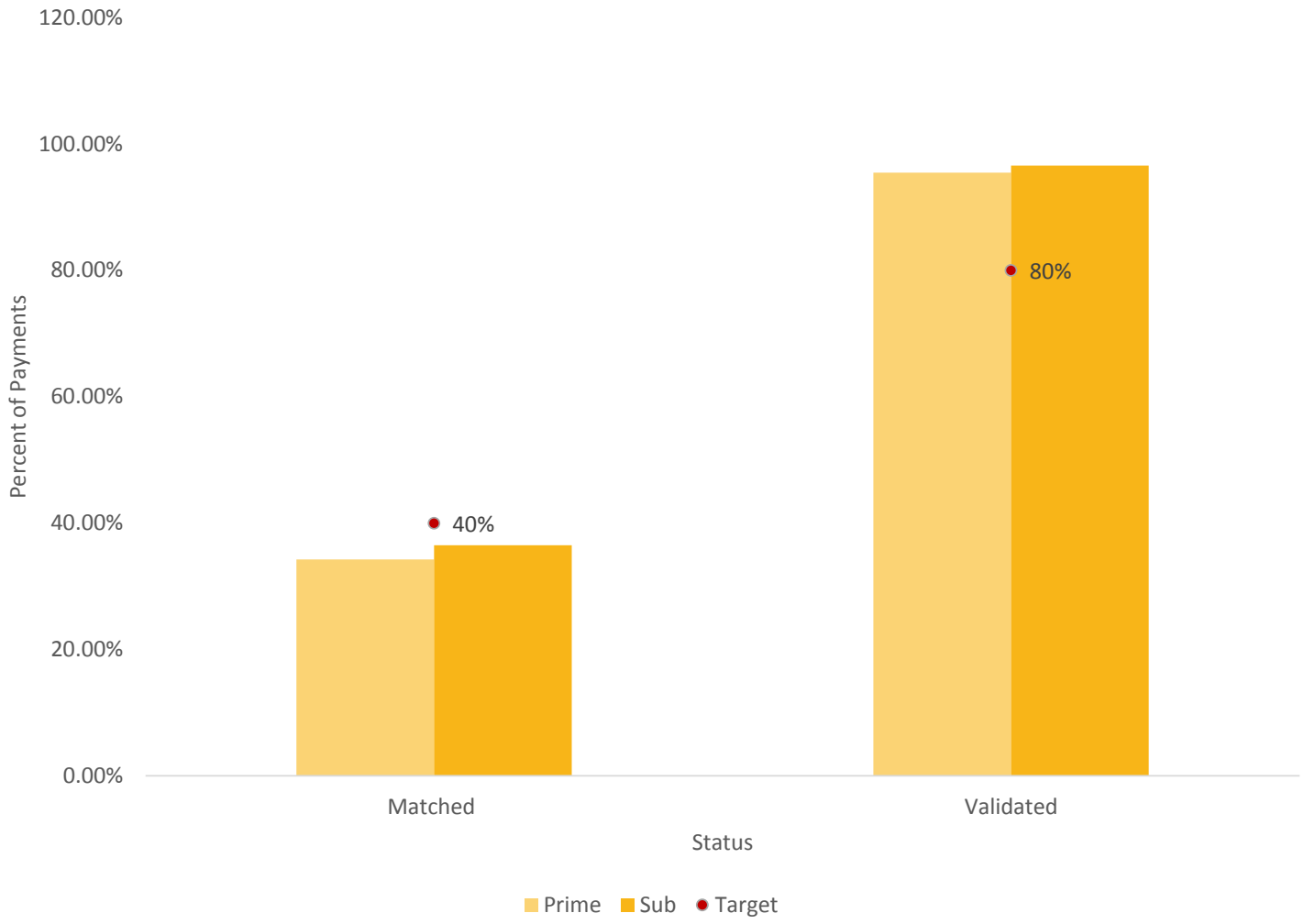
Chart 7.1.2: Sub Matched vs. Unmatched September 2015 - September 2018



PERFORMANCE MEASURE MDTA 7.1

The Number of IFMIS Matched Payments and Validated Payments

Chart 7.1.3: Percent of Matched Payments Validated September 2015 - September 2018



Glossary

All Electronic Tolling (AET) – Collection of tolls at highway speeds using *E-ZPass* transponders or video tolling; no toll booths or cash collection.

Annual Attainment Report on Transportation System Performance – Pursuant to Transportation Article Section 2-103.1 of the Annotated Code of Maryland, the State is required to develop or update an annual performance report on the attainment of transportation goals and benchmarks in the Maryland Transportation Plan (MTP) and Consolidated Transportation Program (CTP). The Attainment Report must be presented annually to the Governor and General Assembly before they may consider the MTP and CTP.

Calendar Year (CY) – The period of 12 months beginning January 1 and ending December 31 of each reporting year.

Coordinated Highways Action Response Team (CHART) – CHART is an incident management system aimed at improving real-time travel conditions on Maryland's highway system. CHART is a joint effort of the State Highway Administration, Maryland Transportation Authority and the Maryland State Police, in cooperation with other federal, state and local agencies.

Consolidated Transportation Program (CTP) – A six-year program of capital projects, which is updated annually to add new projects and reflect changes in financial commitments.

Fiscal Year (FY) – A yearly accounting period covering the time frame between July 1 and June 30 of each reporting year.

MPA General Cargo – Foreign and domestic waterborne general cargo handled at the public (MPA) terminals.

Port of Baltimore Foreign Cargo – International (Foreign) cargo handled at public and private terminals within the Baltimore Port District. This includes bulk cargo (e.g., coal, sugar, petroleum, ore, etc. shipped in bulk) and all general cargo (e.g., miscellaneous goods shipped in various packaging).

MAA – Maryland Aviation Administration operates Baltimore/Washington International Thurgood Marshall Airport (BWI Marshall) and Martin State Airport, a general aviation/reliever airport northeast of Baltimore.

MDTA – Maryland Transportation Authority operates and maintains the State's eight toll facilities.

Mode - Form of transportation used to move people or cargo (e.g., truck, rail, air).

MPA – Maryland Port Administration promotes the Port of Baltimore as a leading east coast hub for cargo and cruise activity.

MTA – Maryland Transit Administration provides Local Bus, Light Rail, Metro Rail, Paratransit services and regional services through commuter rail (MARC) and Commuter Bus, as well as grant funding and technical assistance.

MVA – Motor Vehicle Administration serves as the gateway to Maryland's transportation infrastructure, providing a host of services for drivers and vehicles, including registration, licensing and highway safety initiatives.

SHA – State Highway Administration manages the State's highway system which includes 17,117 lane miles of roads and 2,564 bridges

TBU – Transportation Business Unit

TSO – The Secretary's Office

Vehicle Miles of Travel (VMT) – A measurement of the total miles traveled by all vehicles.

The data contained herein is impacted by a number of variables and may vary and evolve depending on those variables.

Boyd K. Rutherford
Lt. Governor

Larry Hogan
Governor

Pete K. Rahn
Secretary of Transportation

MARYLAND DEPARTMENT OF TRANSPORTATION

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