

Project and Performance Updates

Kevin Quinn, Administrator
May 23, 2019

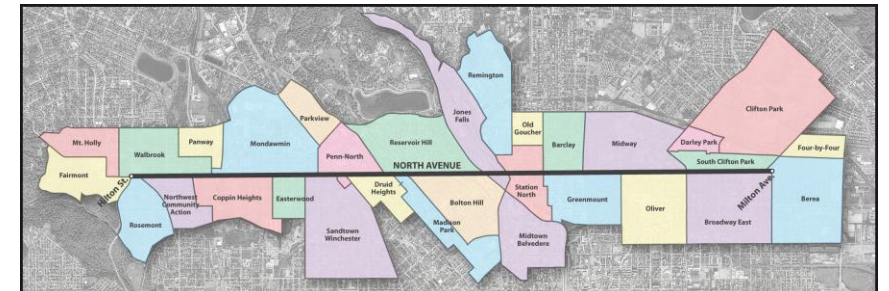


MARYLAND TRANSIT
ADMINISTRATION

North Avenue Rising

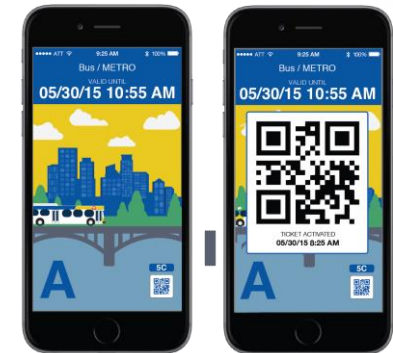
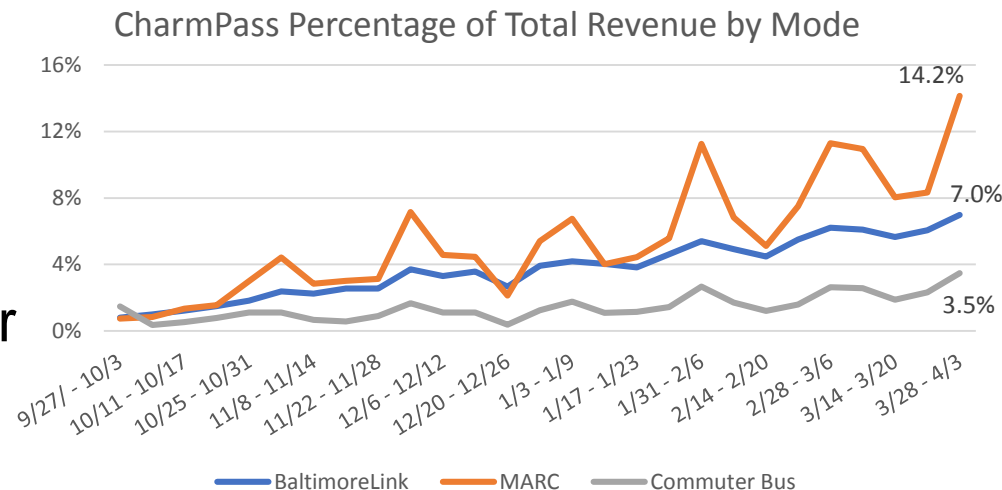


- Project moving from design to construction
 - BCDOT work on Penn-North to start in early June
 - Construction on corridor and station sub-projects to start late summer/early fall
 - Repaving, bus lanes, streetscaping, and enhanced bus stops
 - Elevator repairs, lighting
 - All traffic signal controllers along North Avenue have been replaced for TSP
- Planning underway for community outreach this summer



CharmPass Mobile Ticketing

- Over 97,000 app downloads
- Over \$4.3 million in revenue in 8 months
- Used over 565,000 times since launch on 9/27
- Implementation of SmartBenefits
- 90-minute free transfer window



Dedicated Bus Lanes

- Released report in February
 - Up to 31% time savings; average of 9% per corridor
- MTA Police continues active enforcement efforts
 - Over 5 times as many citations issued in 2019 compared to same time last year
 - Warnings down by over 80 percent
 - Jan – Dec 2018: 973 citations
 - Jan – Apr 2019: 659 citations
 - On pace to double citation total this year
- 7 additional miles of bus lanes with North Avenue Rising

MTA Police Bus Lane Details, Citations, Warnings, and Arrests



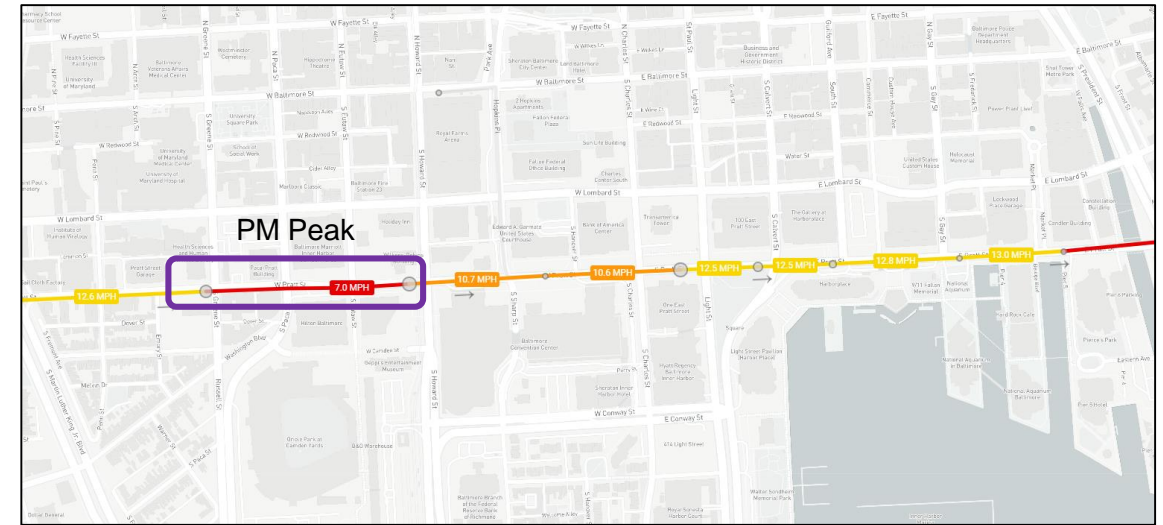
Dedicated Bus Lane Enforcement

- Targeted enforcement efforts through bus speed measurement

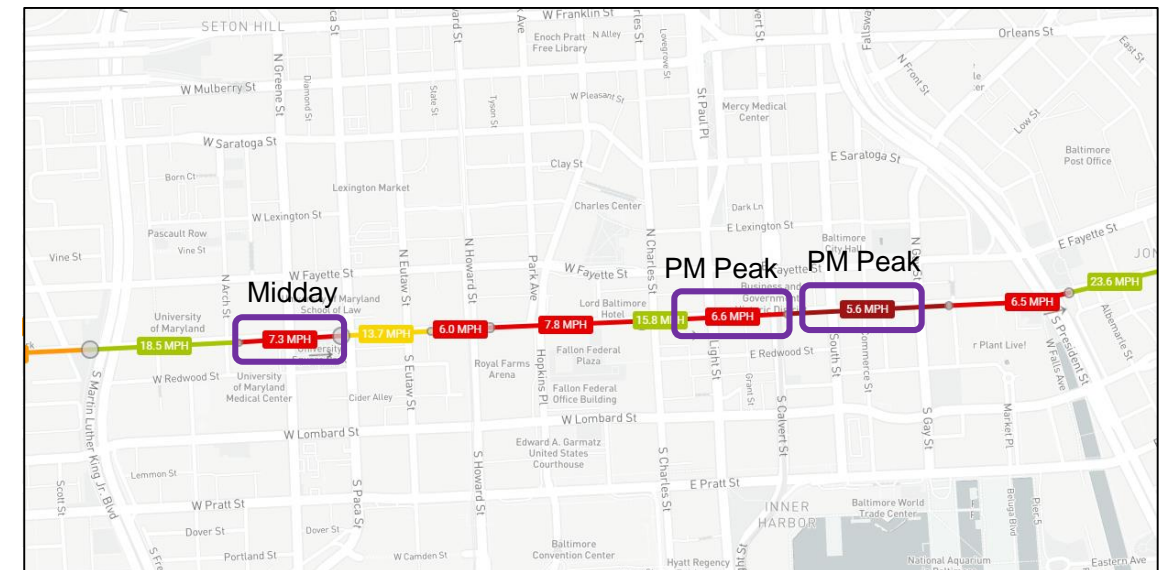
Bus Speed Analysis for Focused Enforcement

Segment/Timeband	Monday 3/18	Tuesday 3/19	Wednesday 3/20	Thursday 3/21	Friday 3/22
Baltimore Street (3PM-7PM) - Calvert Street to Frederick Street	5.48	5.19	5.07	5.28	4.98
Baltimore Street (9AM-3PM) - UM Medical Center to Paca Street	5.85	6.52	6.02	7.09	7.16
Fayette Street (9AM-3PM) - Saint Paul Street to Fayette Plaza	5.1	7.88	5.9	5.73	8.32
Pratt Street (3PM-7PM) - Greene Street to Howard Street	9.56	8.22	7.03	9.37	10.6
Baltimore Street (3PM-7PM) - Calvert Street to Frederick Street	6.55	6.27	5.53	6.51	6.71

CityLink Navy EB from 2/10-3/9

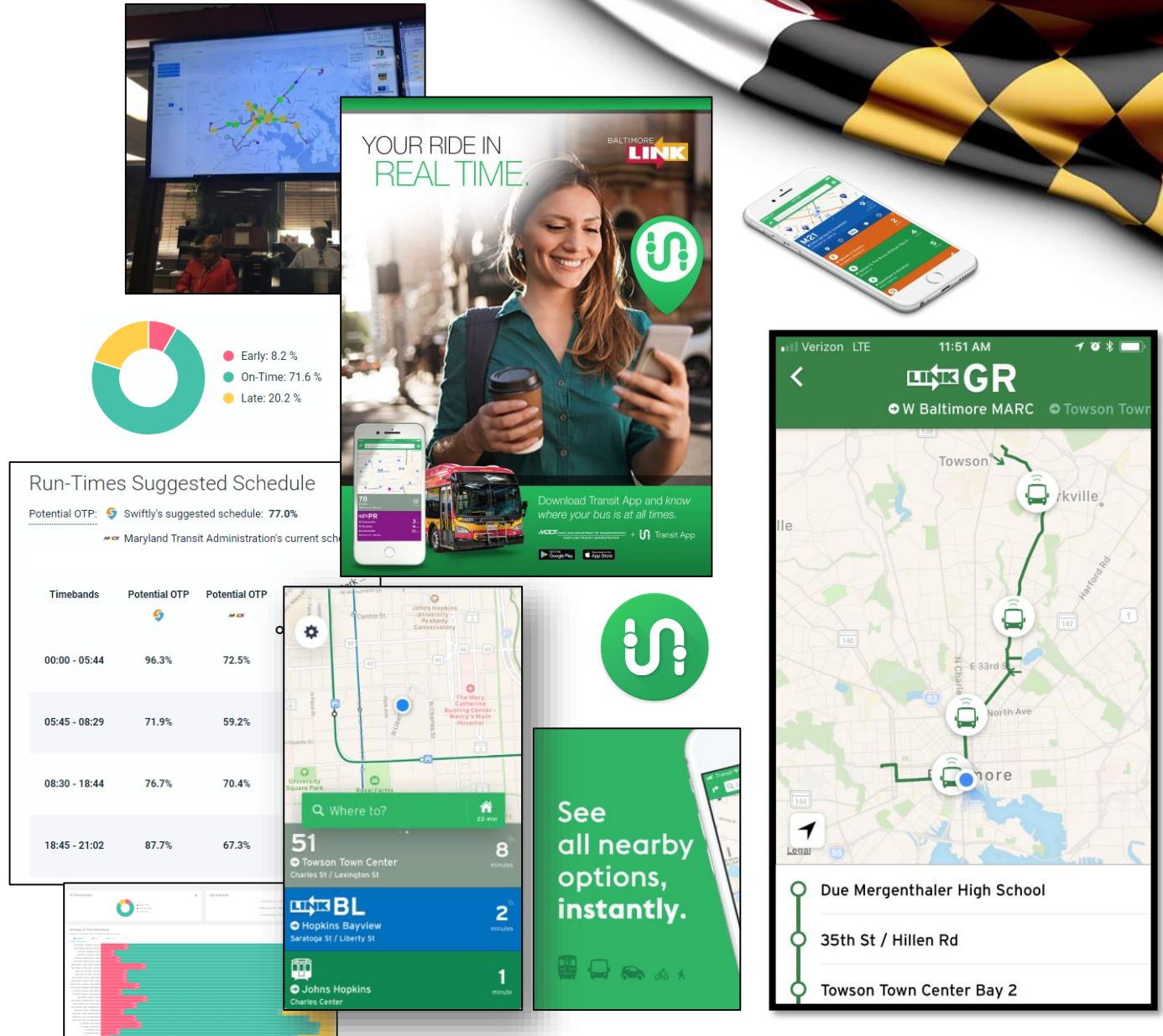


CityLink Orange EB from 2/10-3/9



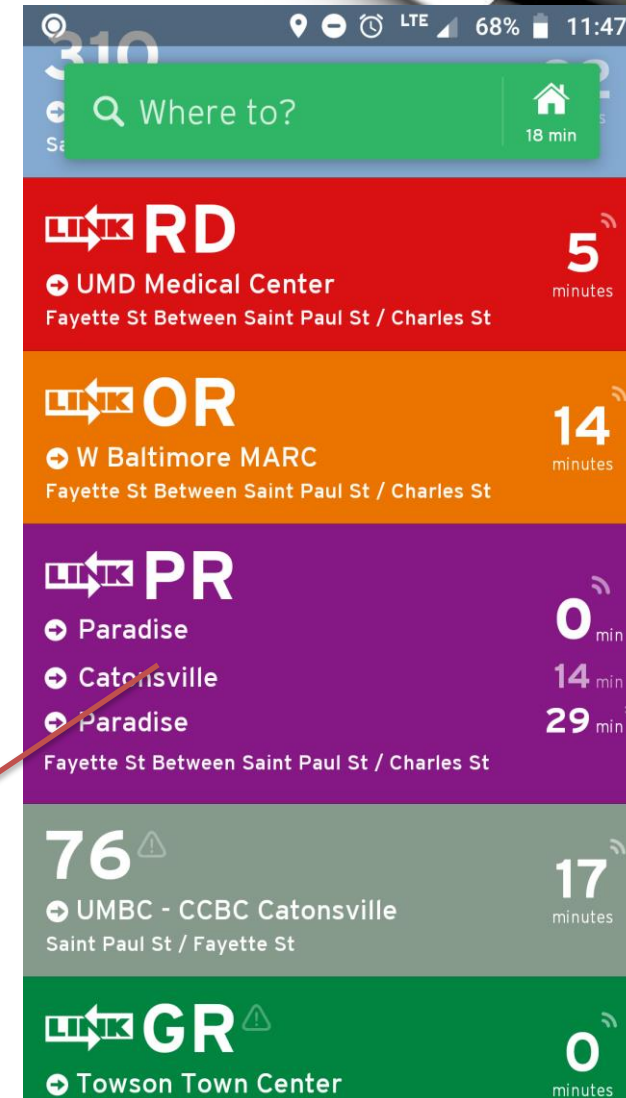
Real-Time Bus Information

- Partnership with Transit app
 - Provides real-time transit information, simple trip planning, and step-by-step navigation
 - Nearly 175,000 downloads since launching on 6/18/18
- As of April 2019:
 - 30% of riders use Transit app on a given weekday
 - Monthly active users increased by 41% year-over-year
- Most popular routes for Transit app are CityLink Blue, CityLink Pink, and CityLink Orange
 - Over 130,000 taps each month
- Used real-time data for February 2019 Service Change (first time in MDOT MTA history)



Improving Real-Time Communications

- Schedule based arrivals are now greyed out in the Transit App
 - This occurs when:
 - Block has not been assigned on time
 - Cut has not been entered on time
 - Bus is not providing a location (non-pinging)
- Allows riders to know when their ride is tracking in real-time



Providing Accurate Real-Time Information

- Accurate GPS Trackers

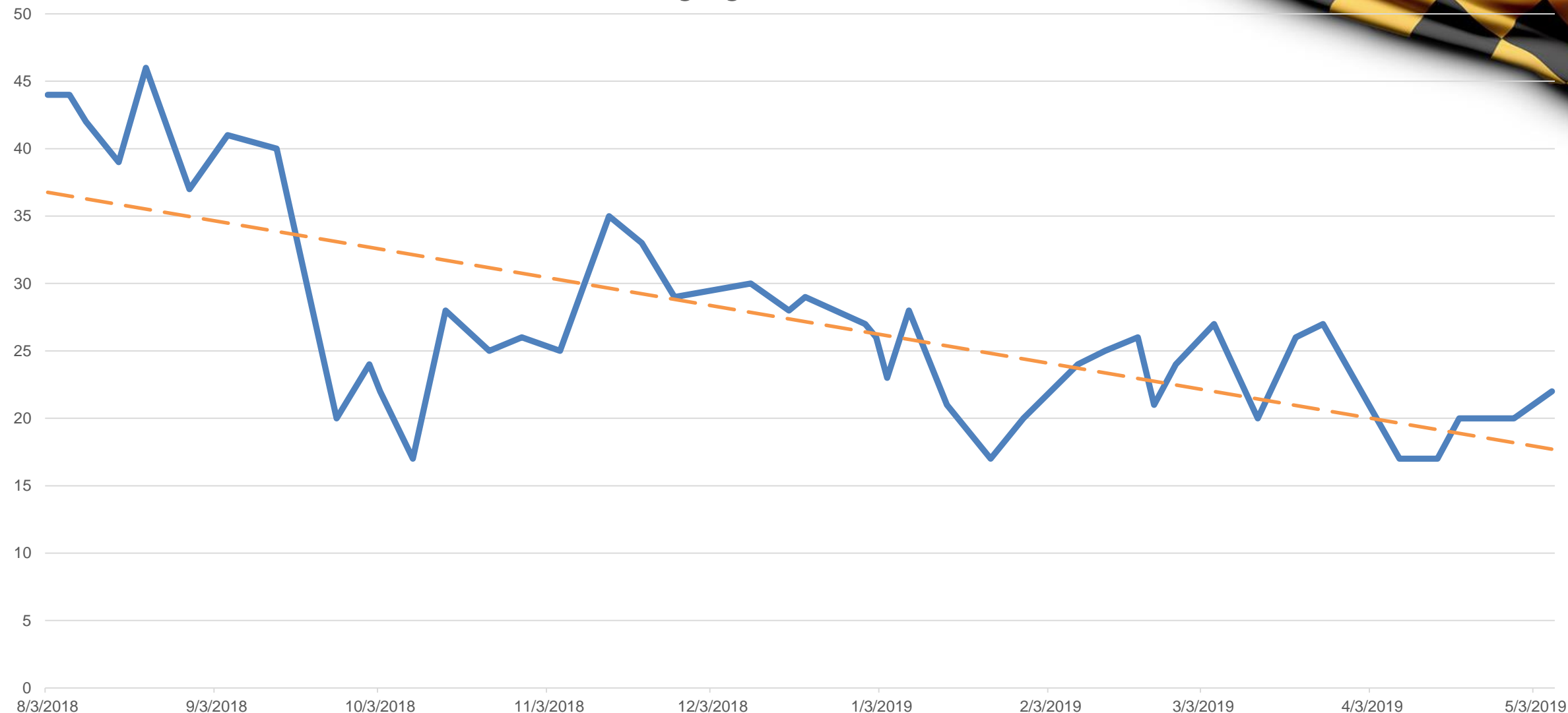
- Minimizing “non-pinging” buses in service
- Ensuring GPS tracking software can receive the location of these buses
- Requires coordination with Bus Maintenance team
- Without a signal, there are no real-time predictions in the Transit app

- Bus Assignment

- Ensuring each bus is linked to a scheduled block (collection of trips)
- Lets our GPS tracking software know which bus is working on which trip
- Timely bus assignment is key to accurate real-time information in Transit app
- Requires coordination with starters and dispatchers at our bus divisions
 - Staff initially unaware that assignment updates needed to occur quickly
 - There were no starters in the evening shift (6PM-2AM) which meant dispatchers were responsible for assigning buses and operators at the same time

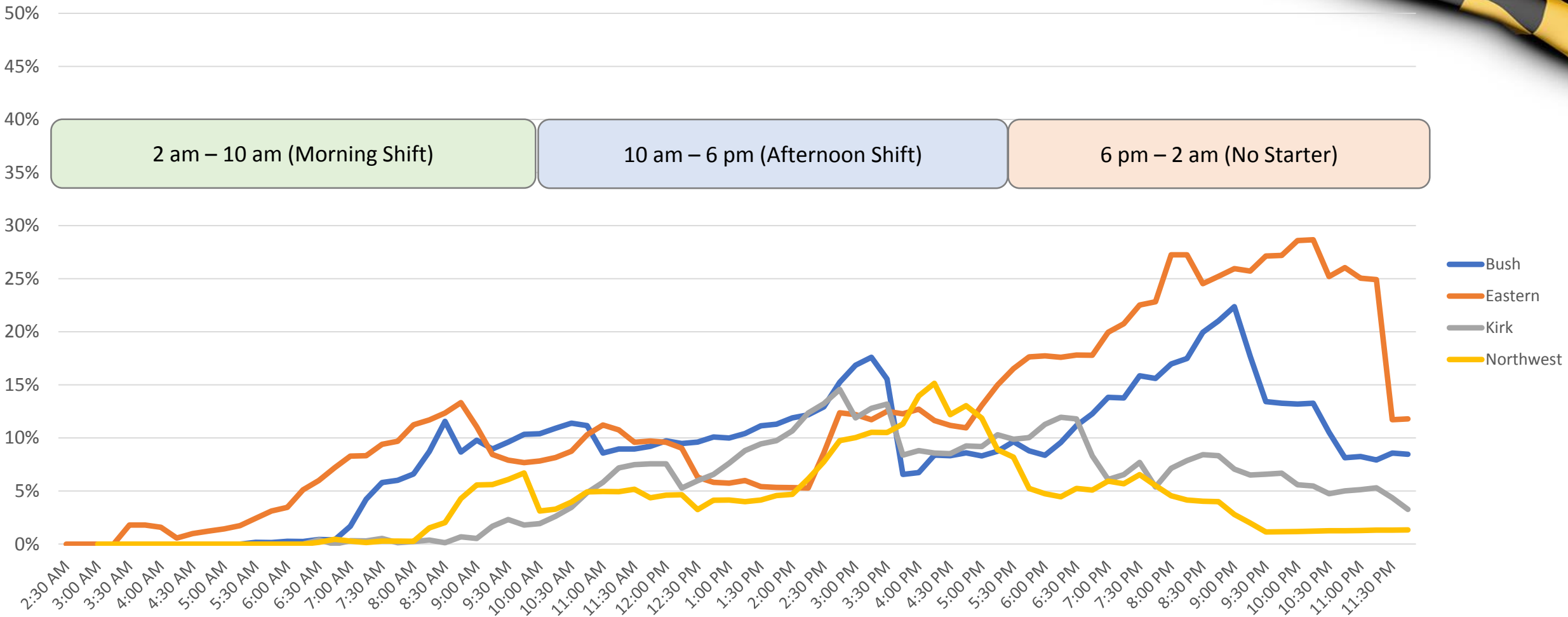
Providing Accurate Real-Time Information

Non-Pinging Buses in Service



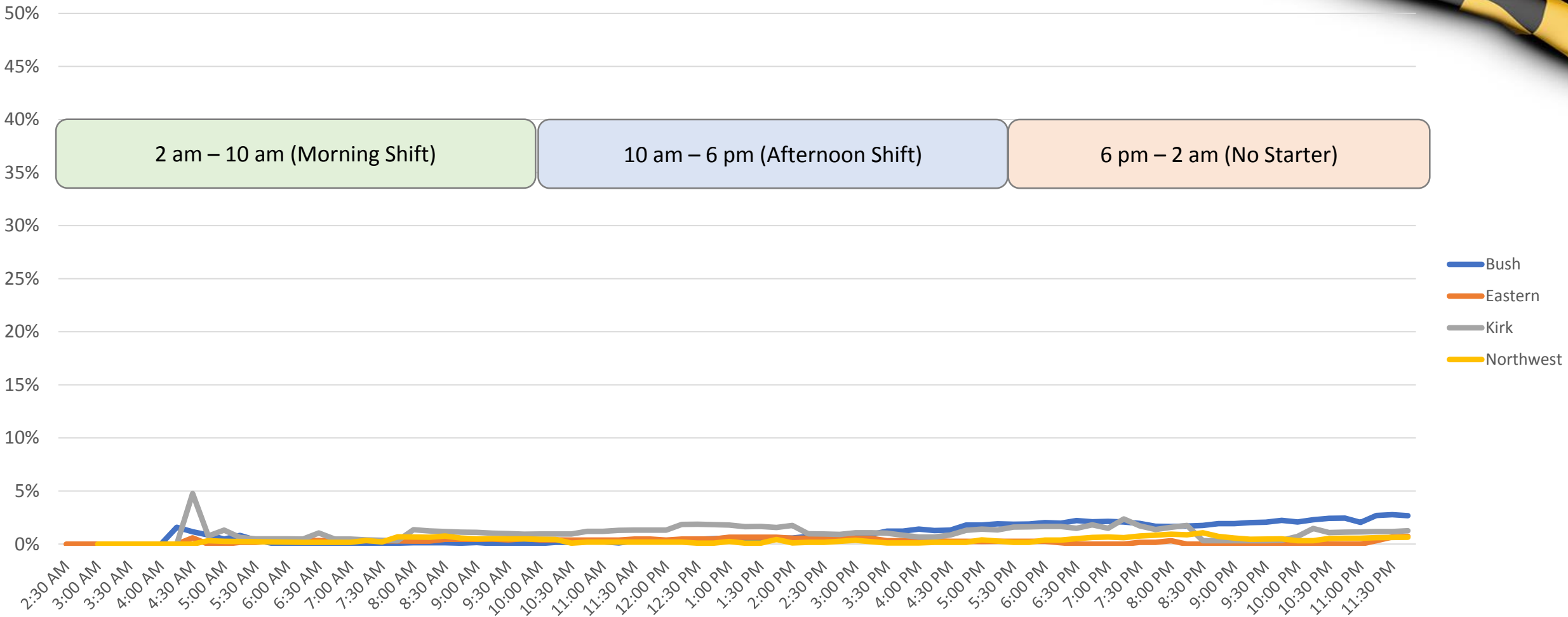
Providing Accurate Real-Time Information

Average Percentage of Unassigned Active Blocks by Hour and Division
First Week of September 2018



Providing Accurate Real-Time Information

Average Percentage of Unassigned Active Blocks by Hour and Division
Last Week of April 2019



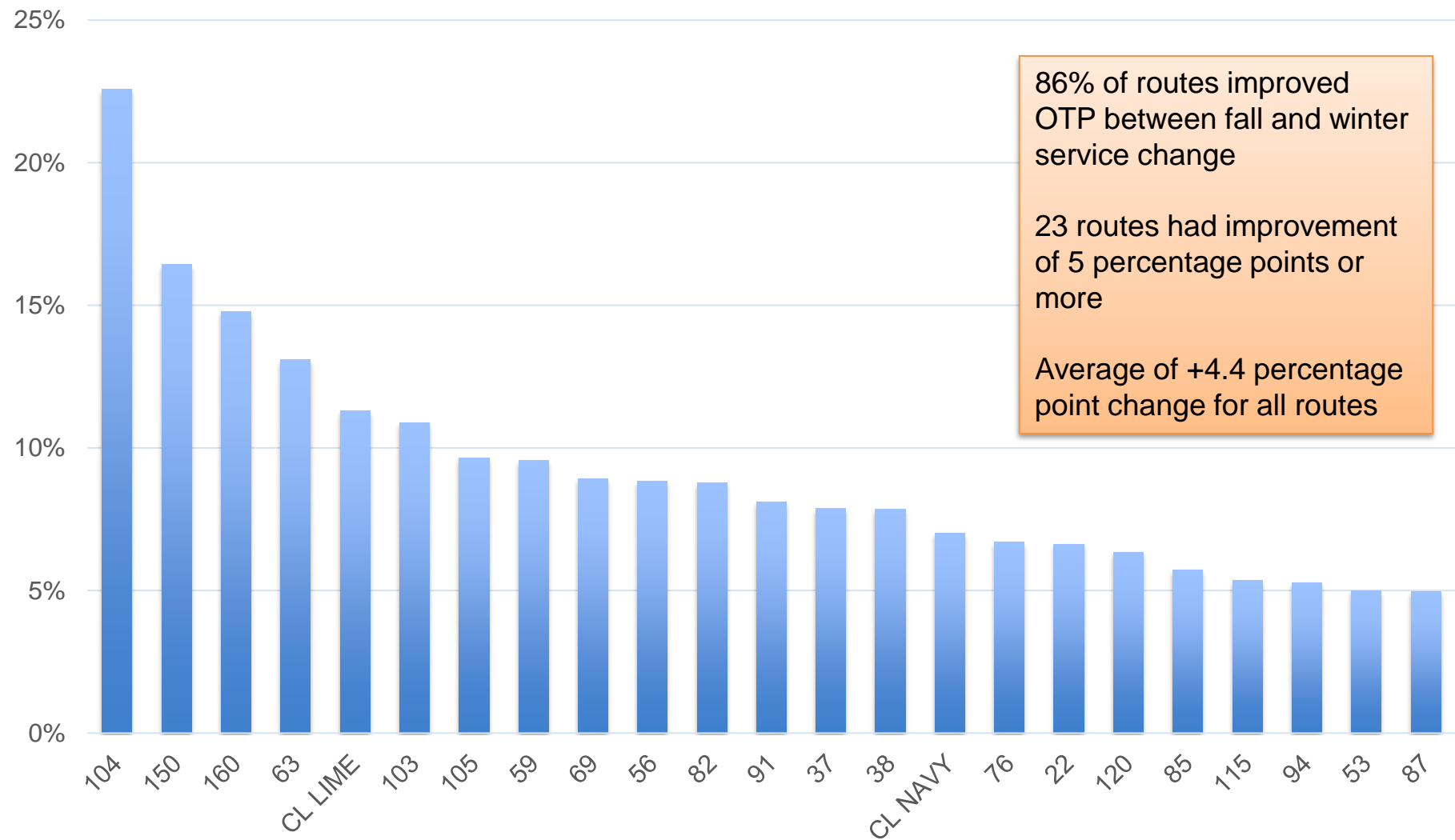
Winter 2019 Service Change – Recap

- Focused on reliability improvements
 - Schedule adjustments, layover requirements, and other operational changes
- Used real-time data for first time in agency's history
 - Runtime changes by service day: 43 weekday, 26 Saturday, and 24 Sunday
 - Runtime changes by service type: 11 CityLink, 32 LocalLink, and 9 Express BusLink
- Trip additions
 - 10 routes with additional trips
 - BR, NV, OR, PK, PR, RD, 54, 80, 85, and 87
 - 8 school trips added
 - PR, 21, 22, 29, 31, 91, 94, 95



Most Improved Routes

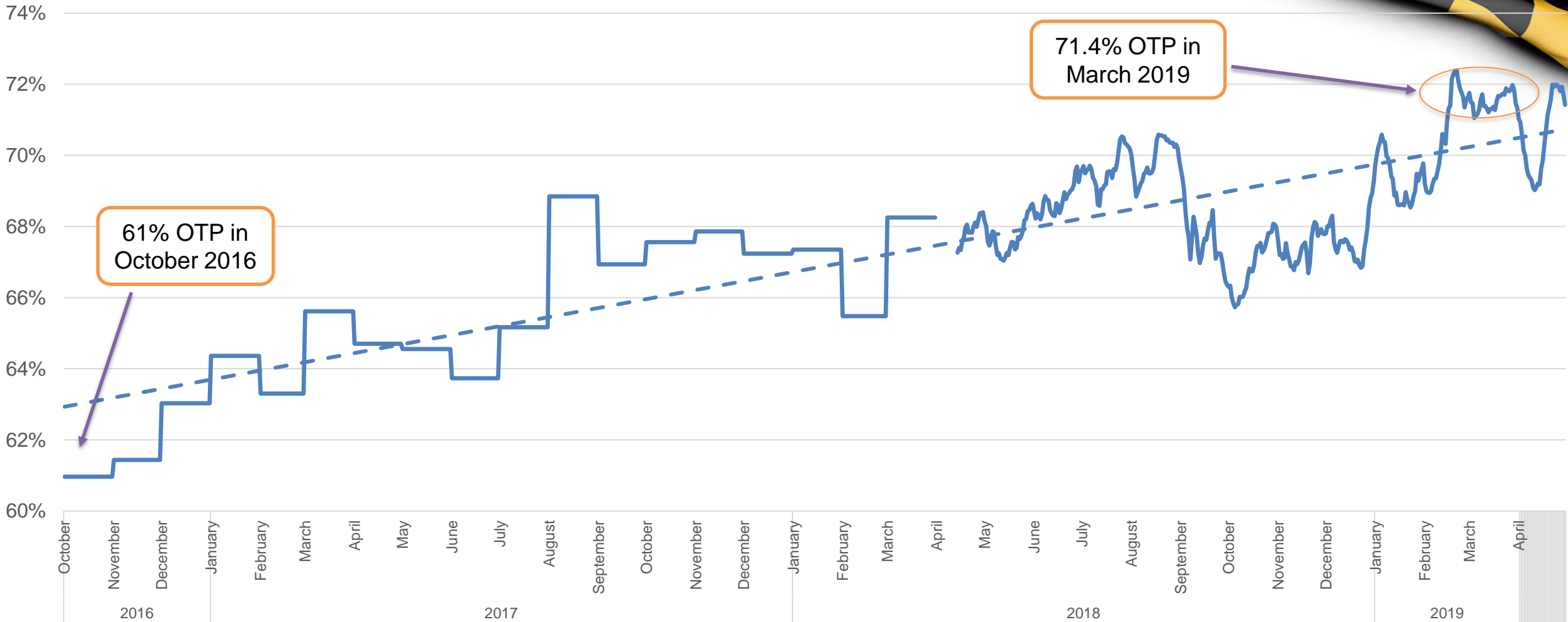
Routes with Most Improved On-Time Performance – Fall to Winter Pick



Route	Fall to Winter OTP Increase
104	22.6%
150	16.4%
160	14.8%
63	13.1%
CL LIME	11.3%
103	10.9%
105	9.7%
59	9.6%
69	8.9%
56	8.8%
82	8.8%
91	8.1%
37	7.9%
38	7.9%
CL NAVY	7.0%
76	6.7%
22	6.6%
120	6.3%
85	5.7%
115	5.4%
94	5.3%
53	5.0%
87	5.0%

Core Bus On-Time Performance

Oct 2016 – April 2018

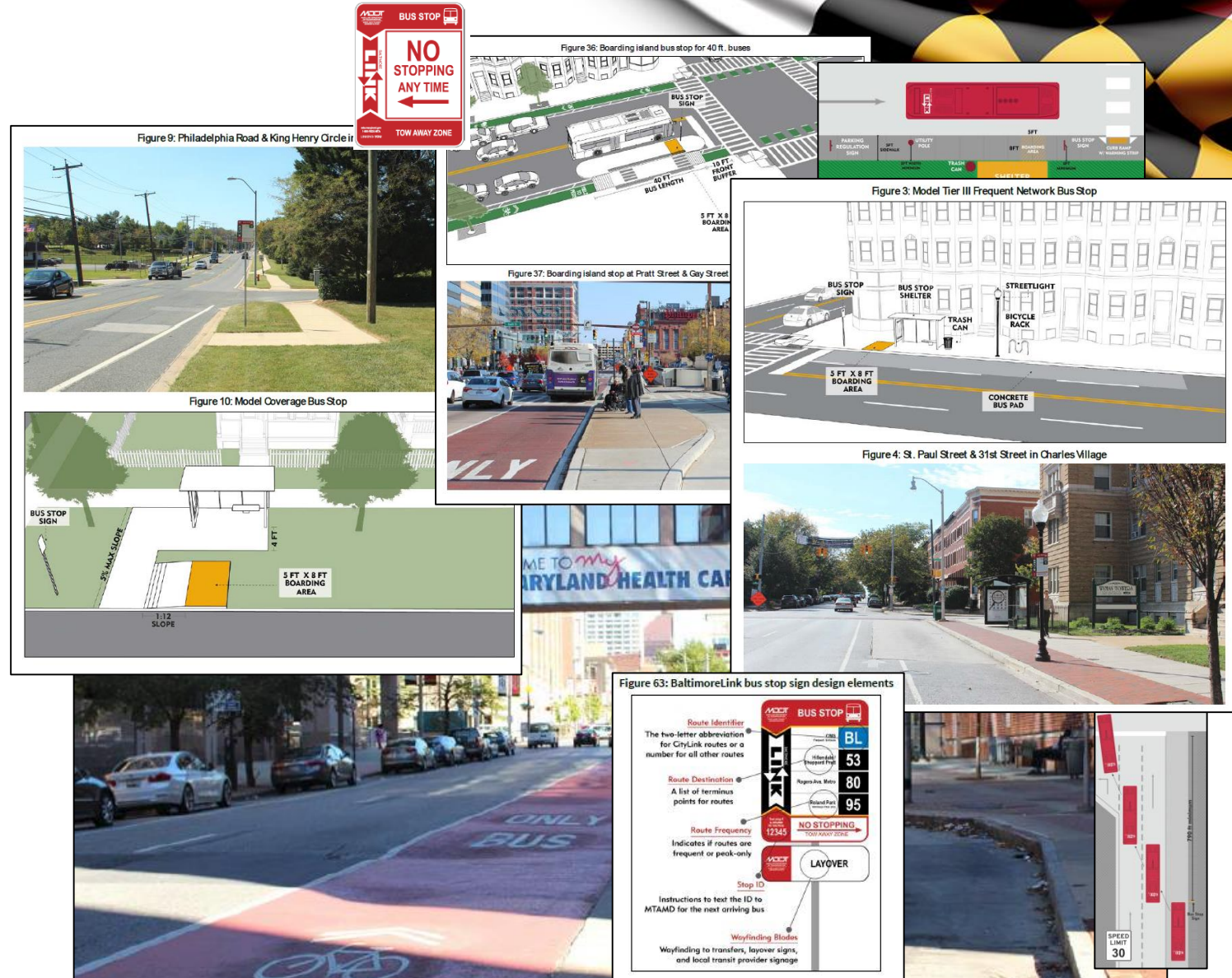


2019 Summer Service Change

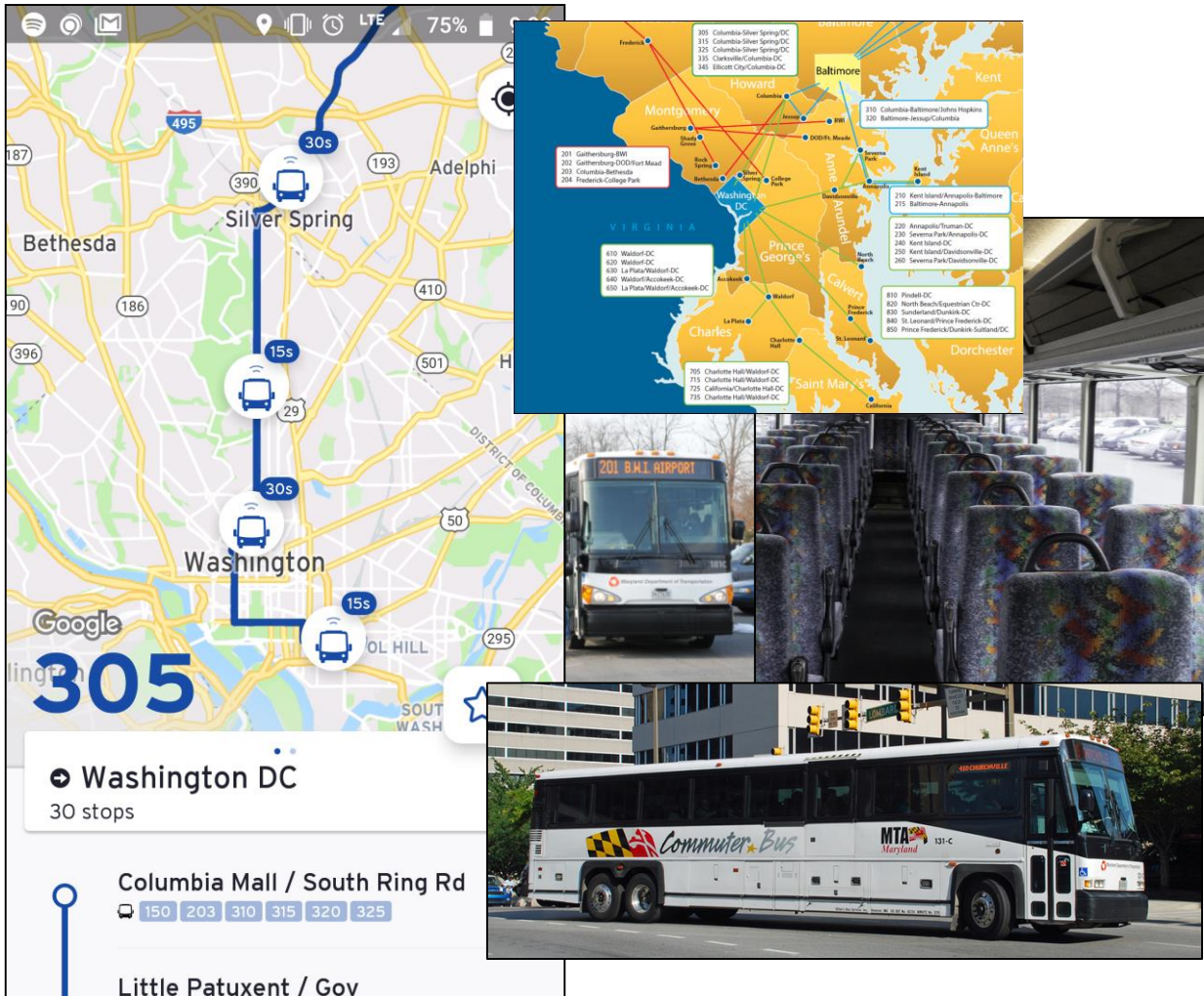
- Every route analyzed and will be modified in some way
 - Time periods, direction, day of service
 - 479 instances of runtime modifications
 - Up from 307 for Winter service change
- Focus on routes:
 - Below 70% on-time
 - Known impediment issue (construction zone, road diet)
- Using data from current pick (February-March)
 - Minimal difference between current data and runtimes from Summer 2018
 - Current roadway conditions have greater effect than seasonal travel patterns

Bus Stop Design Guide

- Provides guidance for the planning, placement, and design of BaltimoreLink bus stops
- Bus stop hierarchy and placement
 - Bus stop types and optimal design in diverse street and road contexts
- Bus stop location
 - Spacing of bus stops
 - Processes and procedures for adding, relocating, and removing bus stops
 - Operational considerations
- Amenities and accessibility
- Release anticipated this summer



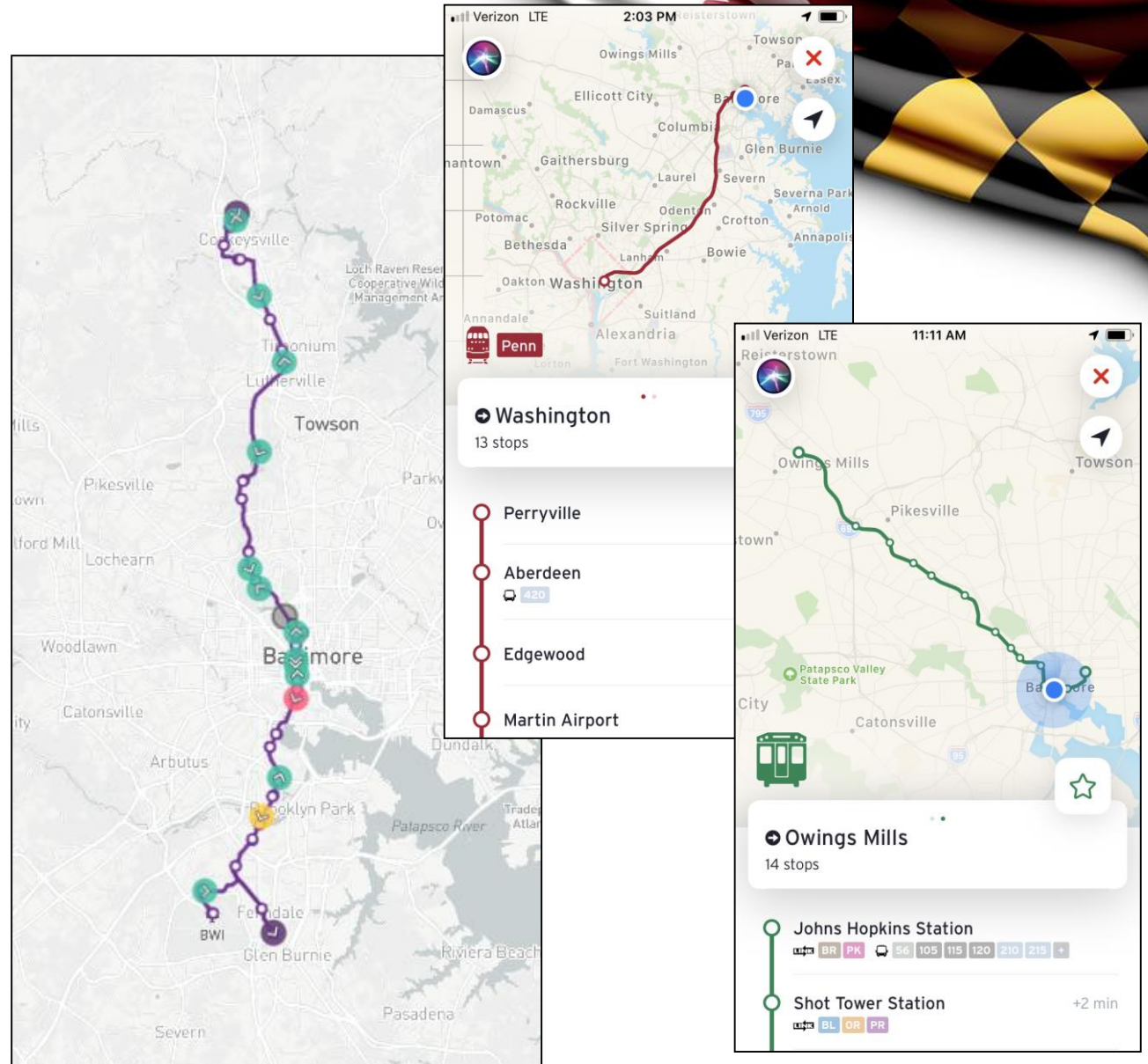
Real-Time on Commuter Bus – Launching 5/23



- Involved coordination with 6 contractors
- Will work across the State of Maryland
- 5th largest commuter bus system in the country
- Customized GTFS feed
- Live feed undergoing testing and QA/QC

Real-Time Updates

- MARC
 - Testing phase
 - Anticipated launch in July
- Light Rail
 - Testing phase
 - Anticipated launch in July
- Metro
 - Anticipated launch in fall



New Website

- New Website
 - Greatly improved mobile interface
 - Built to better address rider needs
 - Stronger focus on system information
 - Routes and schedules at forefront of desktop and mobile-friendly design
 - Updated Trip Planner
- Service Alert System
 - Improved operational efficiency and quicker communication to riders
 - One click updates to Twitter, email, text messages, and website
 - Populates a GTFS-RT feed used by Transit app, displaying alerts to riders
 - The most effective digital communication system the agency has ever had

SmartBenefits[®] is HERE!

Get SmartBenefits

Trip Planner

Suggested routes:

51	12 mins
2:09pm–2:20pm	
CityLink SILVER	15 mins
2:12pm–2:27pm	
	17 mins
2:08pm–2:25pm	
CityLink GREEN	14 mins
2:15pm–2:29pm	

Real Time

Select your route and stop below to get real time arrival information. Results auto-update every 20 seconds.

CityLink NAVY – MONDAWMIN - DUNDA

Dundalk Ave & Baltimore Ave Sb

Est. Arrival Time(s):

- 2:20 PM (8 min)
- 2:29 PM (17 min)
- 2:40 PM (30 min)

Service Alerts

All Alerts MARC Local Bus

Light RailLink Metro SubwayLink

Commuter Bus

To sign up for our alert and notification systems, [click here](#).

Header	Affected Route(s)
Light RailLink Service Advisory	LIGHT RAILLINK: LIGHT RAILLINK
Temporary Rerouting on Preakness Day	30: ROGERS AVE - HOLLANDER RIDGE, 31: SINAI HOSPITAL - SECURITY SQ MALL, 34: FALLS RD/GREENSPRING-

New Performance Improvement Page

MDOT MTA Performance Improvement

On Time Performance by Route

Look up on-time performance by route. Select the route and date range then hit submit for results. Note that large data ranges may result in slow queries.

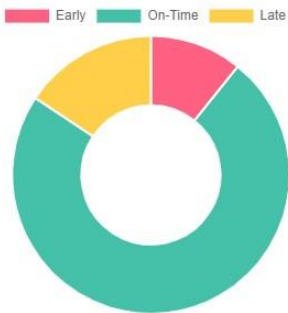
Route
63 -- DOWNTOWN/BAYVIEW-TRADEP

Start Date
04/15/2019

End Date
04/30/2019

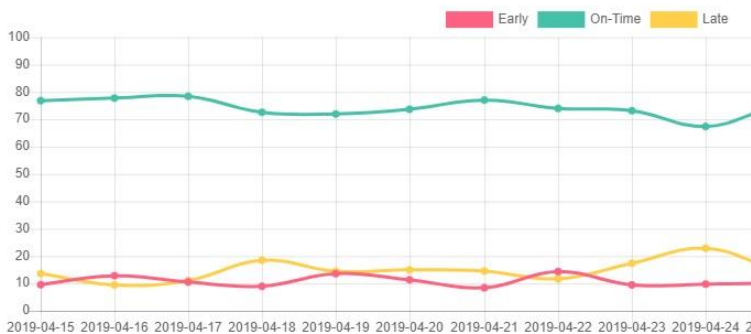
Submit

On-Time Performance - 63



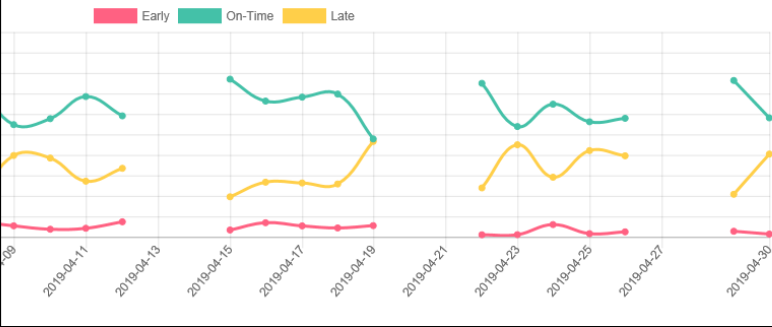
Status	Timepoints
On-Time	4,224 (73.6%)
Early	618 (10.8%)
Late	899 (15.7%)
Total	5,741 (100%)

On-Time Performance By Day - 63



Date	On-Time	Early	Late
2019-04-01	74.8%	7.6%	17.6%
2019-04-02	73.7%	12.8%	13.6%
2019-04-03	62.7%	8.8%	28.5%
2019-04-04	66.8%	8.4%	24.8%
2019-04-05	71.3%	8.2%	20.5%
2019-04-06	57.6%	7.4%	35.0%
2019-04-07	70.7%	3.9%	25.4%
2019-04-08	66.7%	12.9%	20.4%
2019-04-09	69.1%	9.8%	21.2%
2019-04-10	74.2%	7.3%	18.5%
2019-04-11	72.2%	10.0%	17.8%
2019-04-12	73.3%	8.9%	17.8%
2019-04-13	64.2%	9.9%	25.9%
2019-04-14	69.8%	8.5%	21.7%

On-Time Performance By Day - 95



- Searchable OTP by route by day
 - Early, on-time, late
 - Data going back to April 1, 2018
 - Customizable durations
 - Graph and tabular format



Performance Website Demo

