



## **2019 Metrorail Platform Improvement Project After Action Report**

### **BACKGROUND**

Between May 25 and September 8, the Washington Metropolitan Transit Authority (WMATA) closed all four Metrorail stations in Alexandria for platform reconstruction: Braddock Road, King Street-Old Town, Eisenhower Avenue, and Van Dorn Street. Two stations in Fairfax County, Franconia-Springfield and Huntington, were also closed.

This closure disrupted an estimated 17,000 trips each day. During that time, WMATA, the City and other stakeholders worked together to move people to and from Alexandria. The City coordinated plans for WMATA's shuttles, and also provided alternative travel modes. The City also led a massive outreach campaign to get the word out.

### **Current Project Status:**

All Metro Stations south of Reagan National Airport reopened on September 9<sup>th</sup>. Work continued on a rail segment south of Van Dorn Street station until December, resulting in single tracking between Van Dorn Street and Franconia-Springfield.

Work around parking lots and bus loops is also completed. For instance, the Braddock Road bus loop has been completely rebuilt, and not includes new bus shelters built by WMATA.

### **MITIGATION EFFORTS**

Prior to the Shutdown and throughout, the City was actively involved in mitigation efforts to minimize the impact of the Metrorail closure. The following information provides data on utilization of alternative trip measures during the closure period.



#### **Traffic Information**

The City installed additional traffic sensors as part of the PIP to monitor travel times on major corridors. These sensors measured traffic delay, or actual travel time minus expected travel time in free flow conditions. There are now sensors operating for over 40 routes within the City (see Figure 1 for locations), which provide real-time traffic data and collect historical data as well. They will be used to establish a baseline and aid decision-making in the future.

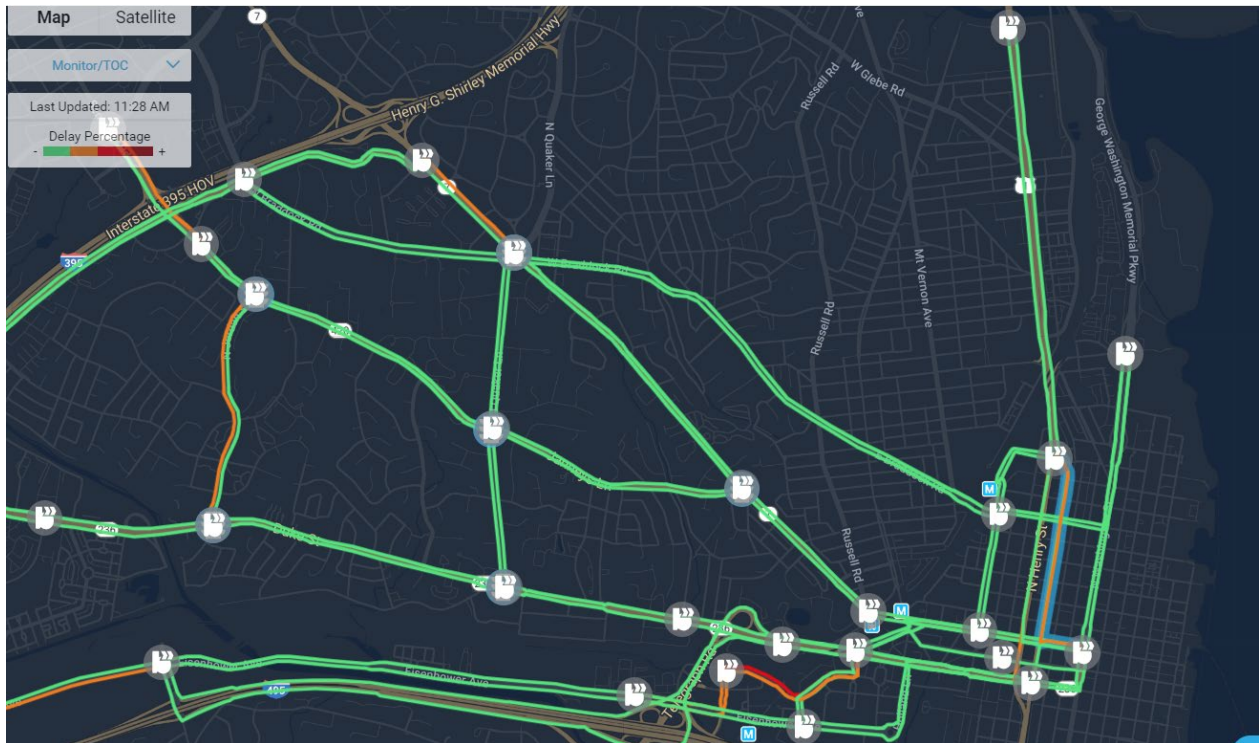


Figure 1 -- Location of real time traffic delay sensors (Blyncsy) within Alexandria

Average delay in the AM peak period was three minutes and seven minutes in the PM peak period. The averages do conceal some outliers. For instance, the highest travel time recorded was on the Duke St. corridor between Patrick St and Walker St, which was 25 minutes in the PM on July 9, versus 9.2 minutes under free flow conditions.

The City cannot compare travel times to other time periods, because the new sensors were installed for the Metrorail shutdown in May 2019. However, even though the PIP is over, this equipment will remain and will aid future planning efforts.



### **Metrorail Shuttles**

WMATA provided five shuttle service routes during the shutdown. Two services (Blue Line Replacement and Yellow Line Replacement) served all Metrorail stops within Alexandria and included a temporary stop during the Shutdown at King and Washington Streets. One service ran express from Landmark Mall to the Pentagon Monday-Friday. Two other services ran express between Huntington and the Pentagon, and Franconia-Springfield and the Pentagon. These did not enter Alexandria's surface streets, but diverted commuters from elsewhere in Northern Virginia from commuting to the Pentagon and the District through Alexandria. A shuttle map is provided in Figure 2.

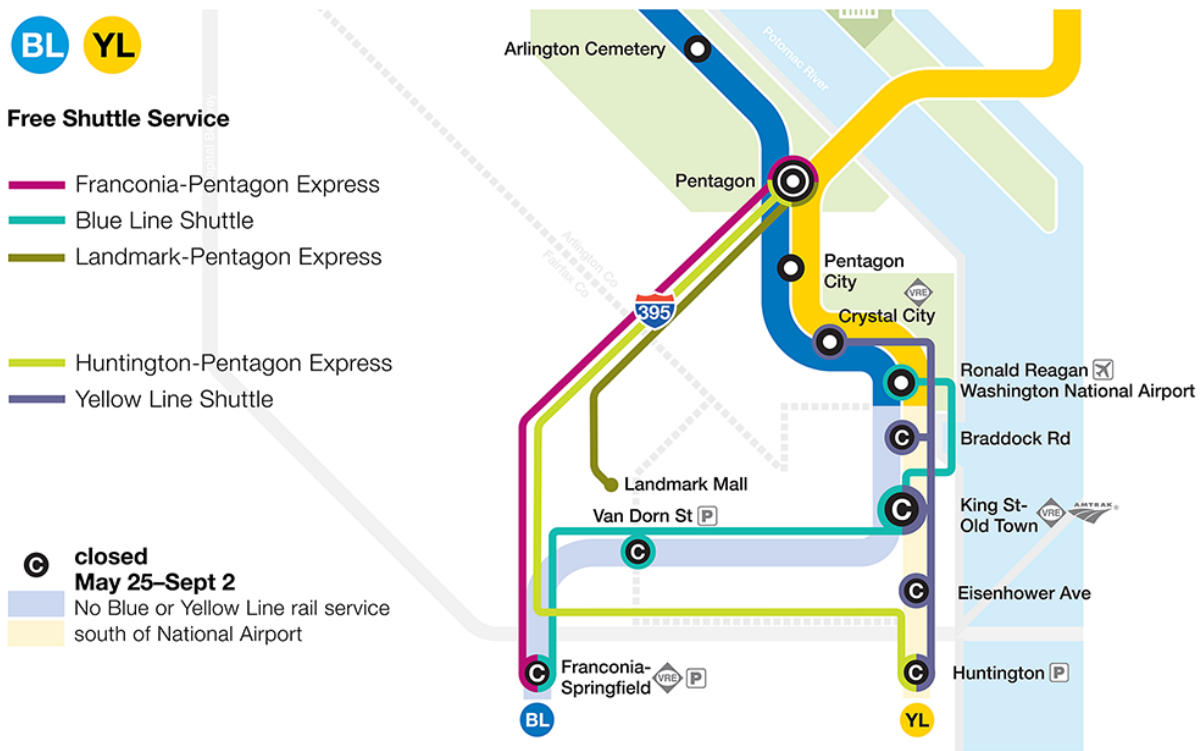


Figure 2 -- Station closures and shuttle service routes during the closure period of the Platform Improvement Project

Figure 3 provides a summary of average daily shuttle bus boardings provided by WMATA staff. On weekdays, the Huntington-Pentagon Express and Franconia-Pentagon Express carried the most riders, diverting these riders from busy bus replacement services within Alexandria.

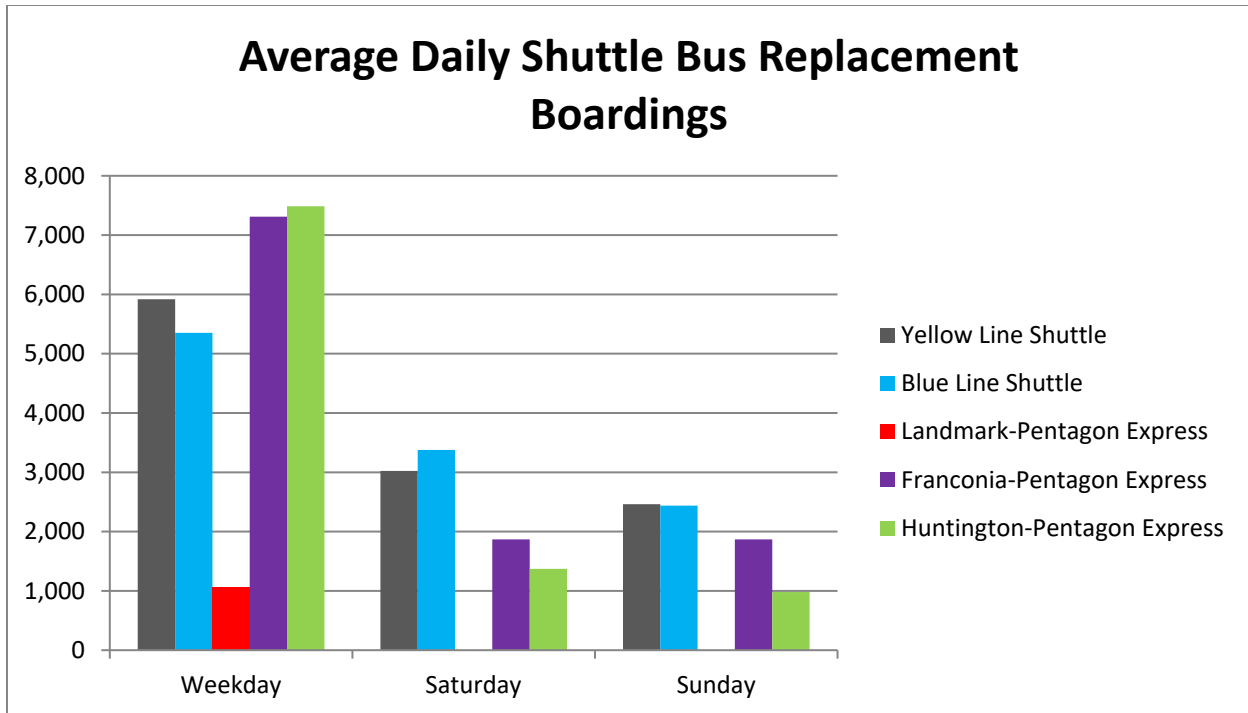


Figure 3 -- Shuttle Boardings



### **Metrobus and DASH**

Metrobus also saw an increase of ridership. WMATA increased ridership on several lines, including Metroway and the 8Z, 10A, 11Y, and 21A. Figure 4 shows the increased ridership in Metrobus as compared to 2018 figures. Metroway had both the highest average daily ridership (3,217) and the second largest increase, at 33 percent.

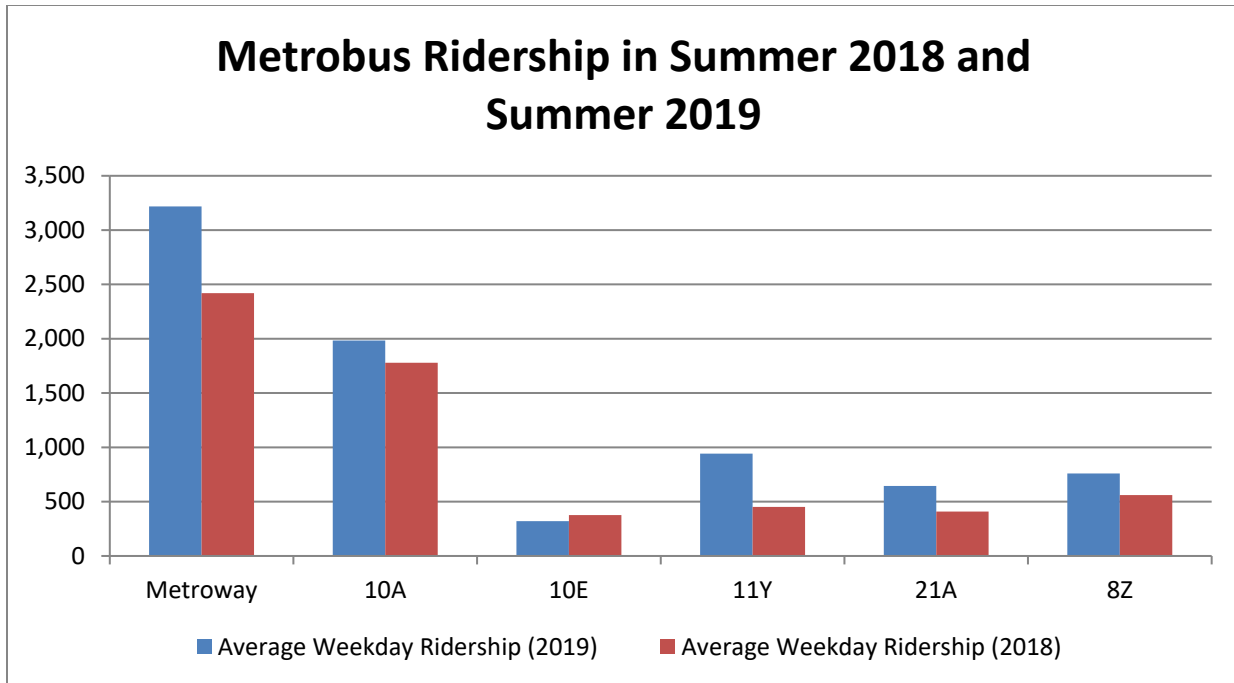


Figure 4 -- Comparative Bus Ridership Between 2018 and 2019

WMATA and City staff both note that the 11Y had several issues, including crowding on buses and frequent bus bunching. This is attributable to a lack of network capacity along the George Washington Parkway. 11Y ridership also grew 109 percent since the same period last year. This sudden surge in ridership can cause issues related to increased dwell time at stops. WMATA did its best to address these issues including adding more buses to the 11Y during peak periods, and making Metroway free. Metroway in particular is a parallel route that runs only three blocks from the 11Y in places

Conversely, DASH regular routes experienced an 8.5 percent decline on all routes in June, July and August 2019, compared with the same months last year. This is likely due to closure of the Metrorail stations, as the busiest stations for DASH are all at Metrorail stations. However, this ridership decline hides key differences in areas of investment that the City made:

- June, July and August ridership on the AT3 and AT4 buses that serve the Pentagon surged by 13 percent and 12.3 percent, respectively. The City invested in additional AT3 and AT4 trips to support this additional ridership.
- King St. Trolley trips declined by 16.6 percent. This is due to the loss of the King St-Old Town Metrorail station. The City worked with DASH to add additional trolley trips for better transit connectivity including starting Trolley service 3 hours earlier at 7AM and providing a replacement stop at King Street Gardens.
- DASH piloted a mobile fare payment option, where DASH discounted one dollar of their two dollar fare if one used the mobile payment option. As of November 12, DASH had 4,986 sign-ups for the Mobile App. DASH had a total of \$14,259.75 of DRPT-supported buy downs.

As with all DASH programs during the Platform Improvement Project, funding came through a Virginia Department of Rail and Public Transportation grant with a 20 percent City match.



### **Water Taxi**

The City worked with the Potomac Riverboat Company to offer this service to commuters. The Water Taxi is a preexisting boat service that goes between Old Town Alexandria and District Wharf in DC, in addition to smaller services to Georgetown and National Harbor in Maryland. As the Water Taxi docked at a City-owned marina, the City placed a lease restriction against water taxi operations before 9:30am. This discouraged commuter operations.

The City Manager temporarily waived that lease restriction so the Water Taxi can serve commuters, which they ran as early as 6:30am. Furthermore, the City also reimbursed commuters up to \$100 on commuter passes valid until the end of the Water Taxi season (December 31, 2019), to encourage commuters. These actions convinced the Potomac Riverboat Company to add up to five additional runs between Old Town Alexandria and District Wharf.



*Figure 5 -- Water Taxi*



### **Biking**

The City did much to support biking. Already having a dense network of multiuse trails both within the City and connecting to other jurisdictions, the City sought to sponsor more bike classes. Ultimately, there was strong evidence in an uptick in biking, including a near doubling of bike traffic on the Potomac Yard trail over the same period the year prior. Projects the City used to support further bicycling included:

- Installation of 144 temporary wayfinding signs for bicyclists
- Classes that let adults feel comfortable with bicycling
- Moving a Capital Bikeshare station near a temporary shuttle stop (at Diagonal Road) one block away to Daingerfield Road and Prince Street. The station was moved back after the project was finished

## **COMMUNITY FEEDBACK**

The City released two feedback forms as part of the PIP: the first one in June to get insight on what information and options people were interested in and the last one in early September to get information on how the shutdown went. There were 648 responses for the September feedback form. Some of the key findings include:

- 76 percent of respondents tried using the free shuttle routes (includes Blue, Yellow, and all three Express routes)
- 53 percent of respondents were satisfied or very satisfied with alternate transportation options, with 27 percent neutral
- 39 percent of all responses made trips without more than 30 minutes delay. The City and WMATA expected at least 45 minutes of delay
- 52 percent of respondents were either satisfied or very satisfied with the information the City put out

In September, the Alexandria Chamber of Commerce and Visit Alexandria jointly put out a survey of local business impacts. Some of the findings of that survey.



- Most **Alexandria businesses** surveyed (51 percent) report that revenue since Metrorail closure was similar to or increased, compared with same period last year. This is not much lower than the 52 percent found in a June survey



- Hotel occupancy declined only 3.5 percent, far lower than the 13.5 percent Visit Alexandria initially projected. During the summer months, total room capacity also declined 6.8 percent, due to the planned demolition of two hotels.

## **BY THE NUMBERS**



- For the month of June, the average **bicycle** volumes nearly doubled (93%) during the morning and evening peak periods on the Potomac Yard Trail, with a 16 percent increase in bicycle traffic on Commonwealth Avenue.



- The City secured a total of **400 parking spaces at Landmark Mall** to be used for commuters as both shuttle parking and as a park and ride and provided 400 free parking permits to commuters using the shuttle.



- The Alexandria Police Department issued 449 HOV related parking **violations** and 308 HOV parking tickets to keep HOV traffic and buses moving along Washington Street.



- The City discounted weeknight and weekend parking rates in **City garages** from \$5 to \$2 and has seen a 10.8% increase in garage utilization compared to the same time in 2018. By the time the shutdown ended on September 9, 57,500 parkers benefited from the reduced rates.



- Over 57,000 weekday trips have been taken on the **Water Taxi** between Alexandria, The Wharf, and National Landing during the morning and evening commute periods. On average, there have been 121 AM riders and 411 PM riders each day, for a total of 532 trips.

## SUCSESSES

There were several successes during the PIP that were a result of the City's planning and coordination with partners. These included:

- Visit Alexandria's "Love your Summer" package – An estimated 1,500 vouchers were distributed, one of the best voucher runs in recent years.
- Water taxi – The water taxi is a private ferry service that operates between Old Town Alexandria and District Wharf, among other places. The water taxi accommodated commuters as early as 6:30 am and moved an average of 5,000 commuters per week.
- New traffic equipment – The City installed sensors that could monitor vehicle travel times in real time. These new 13 sensors, combined with new CCTV cameras at key intersections, allowed City staff to readjust traffic operations, such as signals, in real time.
- Landmark Mall commuter lot – The City leased a portion of Landmark Mall's parking garage to complement WMATA's Landmark Express. In addition to the riders who drove to the lot (a maximum of 323 in a single day), riders also arrived by many residential shuttles that came, contributing to WMATA's 800 riders a day.
- Awareness of new routes, particularly Metroway and the 11Y
- Improved bike wayfinding – The City invested in 207 temporary signs to help bicyclists and pedestrians move around the City. This was critical to help this population move around the City without Metrorail.
- Enhanced HOV lanes along Washington Street – The City converted HOV lanes along Washington St to accommodate the high volume of buses, including the Blue Line Replacement buses. Improvements the City made included extending the hours of HOV lanes in both directions and converting the lanes temporarily from a minimum of two occupants to a minimum of three.

## LESSONS LEARNED

City staff benefited from several lessons learned. Among those lessons learned include the following:

- *Form Partnerships Early* – The City worked with WMATA, the Northern Virginia Transportation Commission, Arlington and Fairfax Counties, and countless business groups and civic associations to get the word out, holding more than thirty public meetings. Visit Alexandria, the Alexandria Chamber of Commerce, and the Alexandria Small Business Development Center were crucial to extending the City's reach to the business community. This would not be possible if staff did not start planning a year in advance.
- *Overcommunicate* – A project such as the Platform Improvement Project would have negative impacts regardless of implementation. It is better to communicate too much with all stakeholders about options and implementation than too little, both about expected impacts and performance data.



- *Be Willing to Try Innovative Solutions* – WMATA estimated that 17,000 people who boarded Metrorail before 10am would seek alternatives. Given the scale of this challenge, staff needed to try solutions that might have seem unconventional. Modifying streets, encouraging a water taxi, and working with WMATA on innovative shuttle routes were part of that picture.

### **NEXT STEPS**

PIP is an ongoing project that will affect multiple stations in the Washington Metropolitan region. This summer, closures will affect the Orange Line in Arlington and Fairfax counties, and in 2021, Ronald Reagan Washington National Airport will also be closed for construction. The City will remain engaged in the following ways:

- Work with NVTC on a marketing campaign to encourage riders back to WMATA
- Offer assistance to jurisdictions affected by the upcoming Orange Line closure between Vienna-Fairfax and East Falls Church Metrorail stations, including the City of Falls Church and Fairfax County
- Monitor WMATA's evolving plans for the closure of Ronald Reagan Washington National Airport in summer of 2021