**FAP# 8888 (286)**

**Contract No:DCKA2011-Q-0241,**

**Task 3B**

**Southeast-Southwest Special Events Study**

**Final Presentation**

**March 6, 2014**

Project “End Game”

• To evaluate what is needed for

transportation network in the

Waterfront/Buzzard Point area to support addition of a major sports venue for the D.C. United Soccer Team, in concert with

other existing and planned development.

**5. Potential Improvements and Mitigations**

This chapter summarizes proposed solutions that can be implemented within the Study area to ease the movement of people during event occurrences. Many of the suggested improvements have already been proposed as part of the M Street Study. While the M Street Study objective was to improve mobility for the entire area during typical peak-hour conditions, these proposed solutions would also improve overall traffic, transit, and pedestrian operation during event days. Some of these improvements could be implemented in next few years; others could be implemented further in the future as long- term solutions.

The Study area is an emerging entertainment zone and events will remain recurring, but largely “manageable” by proactive management. Major sports venues will be active for a maximum of 130 days per year and only during select hours. So, infrastructure should not be built only to handle those event peak flows, but should be recognized and respond to issues on field.

**5.1 Summary of Main Transportation Issues during Events**

Chapter 4 details the results of the analysis and the main findings derived from them. Based on those results, the most critical components of the transportation system that are impacted during special events and require addressing are the following:

**Buzzard Point Transportation and Access to Proposed Soccer Stadium:** Roadway facilities in the vicinity of the proposed Soccer Stadium in the Buzzard Point area are currently deficient or do not exist. The roadway network will need to be improved to provide connectivity and access to the new soccer facility, as well as to nearby parking facilities. In order to avoid severe congestion in the area, additional roadways that connect and provide ingress and egress to the area will need to be improved including additional roadway lanes, lane configuration changes, signal timing optimization, and some new connections.

**Connectivity and Operational Issues:** The lack of adequate capacity and connectivity in close proximity to the proposed location for the Soccer Stadium and to the future developments at Buzzard Point is a major factor in the congestion resulted from high-vehicular and pedestrian volumes during event conditions. While some operational issues will require new connecting roads, especially within the Buzzard Point new development area, other operational issues could be addressed with low-cost transportation system management (TSM) options, such as signal optimization and improvements in lane channelization**.**

**Transit System Needs:** One of DDOT’s main goals for the District is to increase the use of reliable and convenient transit modes. The roadway capacity is constrained, and there are very limited opportunities to add capacity to the network. As such, it is critical for the entire area that reliable and convenient transit options are available. One major improvement needed in the transit system is the implementation of a North-South Streetcar line that could provide transit service into Buzzard Point, allowing for direct transit access to the Soccer Stadium. If the North-South Streetcar is delayed or does not go south of M Street, the implications could be a lower transit share, since the only option for rail transit is the Green Line (Waterfront, Navy Yard-Ballpark, or Anacostia). Walking distances from the Green Line Metro stations to the Soccer Stadium are close to a mile and beyond what is considered “walkable.” To ensure the target transit share of 45 percent or higher can be achieved, it is critical that the streetcar to Buzzard Point be implemented. Other improvements are also needed and are described in the following sections.

**Parking Needs:** Generally there is adequate parking supply in the Study area for typical peak-hour conditions; however, concurrent events at Nationals Park, the proposed Soccer Stadium and Wharf Hall would put a strain on parking resources, especially areas in reasonably close proximity to the Soccer Stadium. Due to the distance from the Green Line Metro stations (Waterfront, Navy Yard-Ballpark, and Anacostia station are all 0.75 to 1 mile from the Soccer Stadium), drive access may be a preferred access mode if those parking facilities are closer than the Metro stations.

**Pedestrian Needs:** Due to the location of transit and parking facilities, pedestrian flow from these locations to the event facilities are extremely high and mostly concentrated in just few pedestrian crossings at intersections. Specific network enhancements and policies are required to facilitate pedestrian accessibility to the event location, avoid unsafe street crossings, and maintain balanced vehicular flows through the main corridors.

**Bicycle System Needs:** With multiple event venues in the Study area, an increase in bicycle use is expected. To support and encourage bicycle use, expansion of Capital Bikeshare locations, provision of bike valet facilities, addition of bike racks, improvements to bike routes and facilities are required to facilitate bicycle accessibility to the event facilities.

**Management and TCO Support:** As the proposed soccer stadium relocates within the Study area, the need for better management of multiple events and deploying additional TCOs to support the current staff becomes vital, especially if concurrent evening events are scheduled at the same time. Specific training opportunities and staffing needs must be assessed for worst-case scenario and resources must be planned to meet the future demand. Also, DDOT should try to work with both Washington Nationals and D.C. United to avoid simultaneous weekday evening events during non-summer period. If such a scenario happens, DDOT should be prepared with a specialized management plan to address any issue.

**5.2 Buzzard Point Transportation Improvements and Access to the Proposed Soccer Stadium**

As discussed in previous chapters, most of the anticipated redevelopment within the Study area is projected to be completed by 2020. One area that may extend beyond that time horizon, in terms of changes in land use and major infrastructure, is Buzzard Point – specifically, the area bounded by South Capitol Street, 2nd Street SW, Q Street SW, and the Anacostia River. Future development plans and the most recent zoning call for high-density, mixed-use development, including the proposed site owned by Akridge known as 100 V Street. The potential redevelopment concepts, highlighted in **Figure 5-1**,

envision up to 2.7 M SF of mixed-use or office space, situated along three blocks between 1st and 2nd Streets, SW. The US Coast Guard headquarters was relocated from the tip of Buzzard Point to the St. Elizabeth Campus in 2013. This will not only open up that site for potential redevelopment or adaptive reuse but also reopen 1st and 2nd Streets, SW, to the Anacostia waterfront. Once these connections are reopened for public use, the improved access to James Creek Marina off 2nd Street and Buzzard Point Marina off 1st Street could significantly change the size and nature of the current facilities. Additional development is also projected for areas north and east of the Ackridge site, between S and Q Streets, SW, and 1st Street SW and South Capitol Street, with the potential for almost 400 residents and over 18,000 employees by 2035, Based on land-use planning data in the Metropolitan Washington Council of Governments (MWCOG) model and from the most recent development plans, these figures would represent an increase of roughly 135 percent in population and 350 percent in employment between 2020 and 2035. In addition to this, the new home for the D.C. United professional soccer team will bring the traffic and pedestrian demand described in previous chapters. As a result, the transportation network in this area would require additional improvements in order to adequately serve the associated trip demands for Buzzard Point and the Soccer Stadium.

The future traffic circulation patterns will require modification from the existing north/south one-way pair to provide for two-way circulation on 1st and 2nd Streets and to improve the sidewalk and bicycle facilities to allow for substantially greater right-of-way (ROW) allocated to those modes, with separate dedicated facilities for each.

DDOT will need to consider engaging with land owners and developers to dedicate enough width as public space to allow for a balanced approach to all transportation modes, not just the minimum width necessary to accommodate only vehicular traffic demands. This may entail requiring greater building setbacks and wider ROW along Half, 1st, and 2nd Streets. Due to the block length of some of the parcels within Buzzard Point, it will be critical that future planned unit developments (PUDs) consider the need for east-west connectivity of pedestrian and bicycle travel by potentially providing for breezeways or non-motorized streets within the development footprint. Otherwise, the current street grid structure could result in several “superblocks” that make non-motorized travel more cumbersome. Additional long-term transportation improvements would need to consider the following:

Extension of north-south transit connectivity within Buzzard Point to substantially build upon the limited service provided by Metrobus Line 74. This may include additional Metrobus services along Half Street SW and 2nd Street SW, extension of future DC Circulator routes along 1st or 2nd Streets, or a potential extension for future DC Streetcar routes.

Potential site locations for a DC Streetcar car barn (storage and maintenance building) integrated within the proposed development plans – possibly in the vicinity of 2nd Street and S Street or Potomac Avenue SW.

Relocation of the existing Buzzard Point motor coach and commuter bus parking lot between 1st and 2nd Streets, SW, to a satellite lot location outside of the Study area. This will also have an implication for Soccer Stadium charter buses. If a location outside the Study area is provided, shuttle services will also need to be provided from this location to the Stadium to shuttle game visitors.

Enhancements to the portion of the Anacostia Riverwalk Trail running along Fort McNair include an increase in trail width and modified hardscape materials that are more characteristic of portions of the trail that run along the water’s edge. (Improvements to differentiate this segment of the trail from standard sidewalks in the vicinity.)

Coordination of on-street parking options, including performance parking, with land-use and site plan

configurations.

Allocation of adequate space and capacity for new Capital Bikeshare stations north of R Street SW and south of S Street SW, integrated within the potential development footprints.

Potential localized shuttle service (unsubsidized /non-public service) to connect the south half of Buzzard Point with the nearest Metrorail stations, located roughly 1 mile away.

**5.3 Potential Improvements to Connectivity along East-West Corridors**

The analysis in Chapter 4 shows that during major event activity (whether a single or two simultaneous events), the network will experience significant congestion along main corridors and some gridlock conditions along minor streets due to extended queues from the intersection with South Capitol Street. One of the factors contributing to the congestion is the noticeable gap in east-west connectivity. This condition induces drivers to use only a few streets available to traverse the area in the east-west direction. Although M Street is the only existing continuous roadway along the east-west axis, several corridors may offer the potential to supplement and balance out the future demands among all modes, as shown in **Figure 5-2**. In addition to future I Street connection improvements in the near term and long term, other street connections that may be considered include L Street SW and K Street SW.

These connections would require reconfiguration of the existing land use and potential network connection as follows:

K Street SW:

−Conversion of 1 ½ linear blocks of Lansburgh Park from existing open space and offset sidewalk to either a bicycle boulevard or a local street with connecting sidewalks on each side (between Delaware Avenue SW and Half Street SW).

−Connection would require compliance with the National Environmental Policy Act (NEPA) and with Section

4(f) for assessment of impacts to parkland.

L Street SW:

−Conversion of 2 linear blocks of publicly owned land from existing surface parking, and associated circulation aisles, to either a bicycle boulevard or a local street with connecting sidewalks on each side (between Delaware Avenue SW and Half Street SW). Parcel parking areas affected would include:

1001 Half Street SW – DC Department of Motor Vehicles Safety Inspection Station

1101 Half Street SW – DC Fire Department Engine Company Number 7

95 M Street SW – DC Department of Motor Vehicles Southwest Service Center

101 M Street SW – DC Metropolitan Police Department First District Station

Connection would require partial or full demolition of two structures: (1) 1001 Half Street SW – DC

Department of Motor Vehicles Safety Inspection Station – service bay number 1; and (2) 95 M Street SW –

DC Department of Motor Vehicles Southwest Service Center.

−Connection would require compliance with NEPA and with Section 4(f) for assessment of impacts to

parkland due to a potential minimal take of land at the southern edge of Lansburgh Park.

Two other long-term strategic street connections southwest of M Street – N and O Streets, SW – could only be considered if the residential neighborhood, River Park, were to undergo a major redevelopment many years in the future. Both streets were reconfigured decades ago, when the area was laid out as a planned high-rise and mid-rise residential development, and represented a departure from the original L’Enfant Plan. Instead of serving as a pair of continuous streets between South Capitol Street and 4th Street SW (and even beyond to the Washington Channel), the streets were broken into smaller residential stubs of roughly one block length between what once was 6th Street SW and 2nd Street/Canal Street SW. A series of cul-de-sacs were constructed at the disconnected ends of the

stubs along N and O Streets. In addition, 3rd and 6th Streets, SW, do not extend south of M Street to provide any north-south connectivity.

In order to reconnect N Street SW, a portion of the existing private swimming pool complex adjacent to Delaware Avenue (the smaller of the two pools to the north) would have to be eliminated. In addition, the existing cul-de-sac east of 4th Street would need to be either demolished or reconfigured to extend N Street farther eastward by approximately 800 linear feet. A reconfiguration of O Street SW to provide a continuous street would require removal of two cul-de-sacs and construction of two segments of 100 linear feet each just west of 3rd Street SW and just west of Canal Street SW. Based on the character of the surrounding land use and the nature of these roadways, the widths would only be able to accommodate one lane in each direction, with on-street parking along one or both sides.

A less costly (and potentially more amenable option to the community) would entail more minor improvements and connections along one or all of these four streets for pedestrians and bicycles only. Along N Street, an existing trail/sidewalk connects non-motorized trips between Canal Street SW and Delaware Avenue; consequently, the remaining connection is limited to the boundary around the pool complex mentioned above. Bicycle and pedestrian connections along O Street SW would mainly entail tie-ins along the circumferential sidewalks at the various cul-desacs. K Street SW already is served by a continuous pedestrian connection through Lansburgh Park; improvements along that corridor would be minimal, if any.

**5.4 Operational / Transportation Systems Management Solutions**

The aim of transportation system management (TSM) is to optimize the safety and efficiency of an existing multimodal transportation system through the use of effective low-cost improvements that have little-to-no environmental impacts and require minimal design, as opposed to high-cost capital improvements. Given the significant number of developments within the Study area and the new Soccer Stadium anticipated to be open by 2016, these improvements will be needed to provide adequate operation not only during events but also during typical peak-hour operation.

The basic infrastructure existing in the area surrounding the proposed location for the Soccer Stadium, and in general in the Buzzard Point area, would not be sufficient to support the future growth of developments and the associated traffic demand for both developments and the new sport facility. To address concerns about congestion, mobility, accessibility, and safety, the following are some of the TSM and low-cost operational improvements that DDOT may choose to implement within the Study area.

**Signing and Pavement Marking Improvements**

DDOT could implement a comprehensive, coordinated sign and information system to allow all users of the roadway to reach their destinations safely and efficiently. To assist in accessing points of attractions/interests by all modes, DDOT could:

Unify signage and naming for consistency purposes.

Increase the use of rapid flashing beacon signs for safer pedestrian crossings at key locations of high pedestrian activity related to events in the future, such as at Maine Avenue/7th Street SW, M Street/4th Street SW, M Street/New Jersey Avenue SE, along South Capitol Street between M Street and the Ballpark district, P Street, Potomac Avenue, etc.

Install speed feedback signs on potential cut-through roadways for traffic calming purposes (display the actual approach speed).

Install signs to show bicycle lanes and shared-use paths.

Install signs at the intersection approaches to show lane control and turn restrictions.

Install way-finding signs (to places of interest and to connect with other intermodal facilities).

Install truck routing signs for all truck trips on Study area arterials. DDOT also could choose to make the following low-cost adjustments to pavement markings to improve safety and circulation:



DDOT also could choose to make the following low-cost adjustments to pavement markings to improve safety and circulation:

Lane-usage pavement markings on approaches along major roadways at a few key intersections. This typically allows motorists to make informed decisions and significantly reduces last-minute lane changes.

Road diets or “right-sizing” on residential streets by restriping would reduce the number of through travel lanes on a roadway and repurpose it for other uses, such as revised channelization, improved pedestrian and bicycle facilities, on-street parking, and/or landscaping.

Pavement markings to indicate “sharrows” (shared bicycle lanes) and promote non-motorized transportation use.

Colored pavement restriping for traffic calming purposes.

On-pavement speed limit markings and/or colored pavement for traffic calming.

School zone pavement markings to ensure Safe Routes to school.

**Signal Timing Optimization along M Street, South Capitol Street, and Areas Near the Soccer Stadium**

Currently, most of the signalized intersections within the Study area operate on pre-timed, uncoordinated signal settings with a cycle length of 100 seconds. With the growth in future traffic demand and the requirements to bring vehicles and pedestrians to the new Soccer Stadium, DDOT should revise these signal timings and subject them to phase revisions to improve traffic flow and reduce congestion as part of the ongoing District-wide initiative to upgrade the overall traffic signal system. In addition, special event signal plans should be developed to implement during events based on expected demand.

Many intersections along the M Street corridor and the South Capitol Street corridor should undergo lane channelization to reduce queues. As part of the ongoing South Capitol Street Supplemental Environmental Impact Statement (SEIS), signalized intersections along the South Capitol Street corridor were analyzed as actuated coordinated signals with newer cycle lengths. At intersections along the M Street corridor, DDOT should consider implementing a new cycle length of 120 seconds or a half-cycle of 60 seconds to be compatible with South Capitol Street operations and optimize the splits.

**Figure 5-3** shows the proposed locations with near-term signal improvements within the Study area.

Other low-cost options that DDOT should consider are:

Pedestrian countdown signals.

Priority signal controls for pedestrians and transit vehicles.

Expanded use of intelligent transportation systems (ITS) to synchronize traffic signals, which increases the throughput of vehicles in the corridor and decreases vehicle hours of delay.

**5.5 Parking System Improvements**

The M Street Study noted that there are more than 19,000 parking spaces between the SE/SW Freeway and the Anacostia River. Of these, about 20 percent are on-street parking spaces, and more than half of those are restricted through Residential Permit Parking (RPP). Parking management strategies for the area should balance short-term availability with resident needs. This section will focus on the parking needs for special events, which will largely include surface parking lots and garages. Generally there is adequate parking in the Study area; however, concurrent events at Nationals Park, the proposed Soccer Stadium, and Wharf Hall would put a strain on parking resources, especially for areas in reasonably close proximity to the Soccer Stadium. Due to the distance between the Green Line Metro stations, (Waterfront, Navy Yard-Ballpark, and Anacostia station are all 0.75 to 1 mile from the Soccer Stadium), drive access may be a preferred access mode if those parking facilities are closer than the Metro

stations.

DDOT has many current and in-progress parking-related policies that aim to achieve a balance between short-term parking needs, residential needs, and traffic requirements. The District is striving to make the Buzzard Point area a pedestrian friendly urban environment, not dependent on the automobile. The Soccer Stadium would be developed in this manner; however, many fans coming into the city for the games may not be comfortable without an automobile mode choice. While effective planning, development, policy, and pricing methods can be used to reduce the number of automobiles, development of adequate parking options will be required for some travelers. Simply increasing parking capacity for special events by building more garages would be expensive and would not conform

to the urban atmosphere planned for Buzzard Point. Potential parking improvements beyond additional supply could be:

Provide details of parking facilities in the area so fans are aware of the options. By developing relationships with private facilities, the D.C. United can be proactive in steering fans to the most appropriate parking opportunities. Real-time parking availability and parking could be provided on the web through Advanced Parking Management Systems. Parking regulations for on-street parking following the Nationals model to avoid event parking from spilling into residential areas. Extend RPP hours in existing neighborhoods with limited residential parking capacity to prevent event parking spillover.

Utilizing the (underused) Anacostia Metrorail station park and ride lot by having shuttle service across the bridge or by staging team-sponsored events in the Anacostia area before and after games to encourage fans to park there. This would have the dual benefit of providing large amounts of parking and keeping automobiles out of the most congested areas of the network and allowing them to use higher-facility roadways such as I-295 and Suitland Parkway.

Pricing of parking facilities needs to be based on the market value of the parking opportunity. Effective pricing will encourage fans to consider other access modes and ridesharing to reduce the cost per person. Non-permit, on-street parking should be priced differently during events than it is normally. Short-term parking could remain relatively low cost during the event, but parking durations over 60 or 90 minutes could have a much higher rate.

This would allow on-street parking to be available for non-event travelers or event parking and would be priced accordingly. Advanced Smart Meters can change rates based on event schedule. Aggressive enforcement and fine structures would be required to make this policy effective.

Enhance goDCgo.com with updated parking regulations as they are revised or modified. This robust

informational website is updated often with current information, such as truck and bus routes and suggested parking locations.

Consider providing transit incentives (such as Metro fare included in ticket prices) to encourage visitors to use transit to travel to events. Reducing parking supply requirements can lower development costs and reduce impervious areas. This type of development helps encourage the use of non-automobile transportation alternatives which helps make urban spaces more viable.

**5.6 Transit Improvements**

Transit service to Buzzard Point is currently provided by two modes: Metrorail and bus. The Metro Green Line would carry the largest proportion of transit trips to the special events, either to Nationals Park or the D.C. United Stadium. As described in Chapter 3, WMATA operates several Metrobus service lines that pass along M Street and South Capitol Street and into Buzzard Point to P Street on the 74 bus route. The Study assumed the development of the North-South Streetcar line providing service into Buzzard Point. It was assumed that the streetcar service operated at a ten-minute headway, providing a total capacity of 960 passengers per hour. Other transit policies could include:

Ability to add service to transit during peak times to address peak demand

Addition of turnback tracks for metrorail to provide improved transit service to the highest-demand segments along the Green Line.

Provide staging area for streetcar, possibly incorporated with the maintenance facility/car barn proposed in the Buzzard Point area.

Increased service on North-South Streetcar Line. Depending on vehicle availability, frequency could be

increased to provide more capacity for special events. Alternatively buses could run on the streetcar route, providing additional capacity during the special-event peaks.

Buses from L’Enfant and Anacostia Metrorail stations could shuttle travelers to the Stadium to eliminate the long access/ egress walks from Waterfront and Navy Yard-Ballpark.

Provide charter buses from suburban locations to the Stadium. Working with WMATA, DDOT should develop a plan to actively identify additional pedestrian access points at the existing Green Line Metro stations. These potential additional entry points would coincide with the areas of substantial future development and higher densities as well as serving special events such as Wharf Hall and D.C. United soccer events:

L’Enfant Plaza Station – Additional access to/from the south with better connectivity to future development at

the Wharf along the Southwest Waterfront.

Waterfront Station – Second entrance providing access to/from the west and south with connectivity to future development at the Wharf along the Southwest Waterfront. By providing a station access location south of M Street, it would reduce pedestrians crossing the major arterial between the station and the Soccer Stadium.

**5.7 Pedestrian and Bicycle Improvements**

Several of DDOT’s policies, agenda actions, and goals focus on the bicycle and pedestrian modes of travel; however, DDOT’s ultimate goal is to ensure that designs and modifications would allow an unaccompanied 12-year old to safely travel the roadways by foot, bicycle, and/or transit. In the 2013-2018 Transportation Improvement Plan, DDOT set aside 5 percent (just under $29 million of its total capital project expenditures) for bicycle and pedestrian projects in Fiscal Year 2012. Through these projects, DDOT intends to reduce fuel costs, pollution, and congestion while improving safety and boosting physical activity. Specific projects to achieve these agency goals are included in

the bicycle and pedestrian master plans. (www.ddot.dc.gov/DC/DDOT/On+Your+Street/Bicycles+and+Pedestrians).

Consistent with that goal is to provide safe pedestrian access to Nationals Park, the D.C. United Stadium and other special event venues in the area. Due to the location of transit and parking facilities, pedestrian flow from these locations is an important need. Specific network enhancements and policies are required to assist pedestrians to access the event location. Additionally, the pedestrian programs listed in the M Street Study should be implemented, especially the expanded use of manned traffic control at “hot-spot” locations at peak event times.

Specific network enhancements could be:

Waterfront Metro station access and egress point on the south side of M Street to avoid transit passengers having to cross M Street to access the Wharf or Soccer Stadium.

Pedestrian underpass or overpass at the northern end of the Frederick Douglass Memorial Bridge to allow pedestrians from Anacostia to cross South Capitol Street without reducing the through capacity of South Capitol Street. This pedestrian crossing could also serve pedestrians from Navy Yard-Ballpark Metro station who could cross South Capitol Street near Potomac Avenue.

Designate and manage pedestrian pathways from metrorail stations to major venues on event days. Wherever possible, wider sidewalk widths must be provided to handle the event-related pedestrian capacity.

Half Street, SE already operates as “festival street” during home games at the Nationals Park. Consider

transforming Half Street, SW between P Street and Potomac Avenue into a similar “festival street” during home events at the proposed soccer stadium.

With multiple event venues in the Study area, an increase in bicycle use is expected. To support and encourage bicycle use, expansion of Capital Bikeshare locations, provision of bike valet facilities, addition of bike racks, improvements to bike routes and facilities are required to facilitate bicycle accessibility to the event facilities.

Provide ample bicycle parking near the Stadium. The Capital Bikeshare program continues to grow in the District and throughout the DC region. Expand the Capitol Bikeshare program in Buzzard Point to improve the access from Waterfront, Navy Yard-Ballpark, and Anacostia stations. Provide bike racks near the Stadium to encourage

bike use.

Explore the possibility of adding bicycle facilities at the Explore the possibility of adding bicycle facilities at the under-utilized park and ride lot of Anacostia Metrorail station.

**5.8 Waterways and Commuter Ferries**

DDOT has partnered with the Northern Virginia Regional Commission (NVRC) to conduct a study that will assess and determine the viability of reliable commuter ferry service in the National Capital Region as a supplement to existing transit services. As part of the study effort, a Commuter Ferry Boat Stakeholder Committee has been developed to perform a market analysis to determine the likely commuter and tourist passenger demand for high-speed commuter ferry service between selected origin and destination locations on the Occoquan, Potomac, and Anacostia Rivers. Preliminary studies indicate that a number of existing marinas and waterfront areas in Northern Virginia, Maryland, and the District of Columbia could serve as possible origin and destination points in an interconnected network of water taxi / commuter ferry services.

The Stakeholder Committee is comprised of two dozen representatives from Maryland, Virginia, and the District of Columbia. The market analysis is expected to assist the Committee with the analysis necessary to make well informed planning, policy and budgetary decisions regarding the future of commuter ferry passenger transportation in the region. The findings of the analysis will help drive the future operational configuration of a water-based transit system serving points within the Study area such as the Wharf on Washington Channel, Buzzard Point Marina, and new water access points at the Yards development and adjacent to Nationals Park stadium. As the SE/SW area transforms into an emerging entertainment and activity zone, an increase in the frequency of the water taxi adds more benefits.

**5.9 Potential Impact of Left Turns On South Capitol Street Corridor**

The South Capitol Street SEIS, which is currently under way, has recently identified additional improvements along South Capitol Street between M Street and the Southeast Freeway (I-695) to include the provision of left-turn bays at the following intersections:

I Street – SB lefts and NB lefts

L Street – SB lefts

M Street – SB lefts – one left-turn bay instead of two, as originally shown in the previous planning and NEPA studies .

The need for these turn bays was derived from recent analysis of more up-to-date development information from DC Office of Planning, the Capital Riverfront BID, and Deputy Mayor’s Office for Planning and Economic Development. By providing additional turn bays at I Street and L Street intersections, the total number of left-turn vehicles at M Street is reduced, which helps alleviate the tendency towards bottlenecking at major intersections in the Study area.

While this set of modifications was derived through the recently-completed follow-up studies for the South Capitol Street SEIS, the proposed improvements could also benefit traffic operations during special events, especially in the game or concert at Nationals Park. The redistribution of left turns amongst multiple streets, as opposed to being concentrated at M Street, would allow for multiple routes to on-street and off-street parking in the areas between M Street and I Street.

Today, all traffic from South Capitol Street headed to these destinations must turn left at M Street. These improvements were not confirmed as part of the revised preferred alternative in the SEIS until the traffic analysis for the Study was completed. However, a recommendation coming out of this Study, based on very preliminary qualitative comparisons of trip patterns, would be to consider the proposed left-turn improvements as a mitigation strategy to the current traffic operational issues along South Capitol Street and M Street during special events. If additional traffic analysis is required to quantitatively validate that left-turn improvements would benefit special events traffic operations, an additional assessment could be performed as an add-on to the South Capitol Street SEIS or as a follow-on addendum to this Study.

**5.10 Proposed 2040 Metrorail Improvements**

Interlining of the Metro Yellow Line with the Green Line between L’Enfant Plaza and Anacostia / Greenbelt was referenced in the previous M Street / SE-SW Transportation Planning Study. At the time of publication, WMATA was considering multiple options for providing enhanced service through the Study area. Since that time, WMATA has revised their proposals to construct additional capacity along the M Street SE/SW corridor below grade.

While these improvements are long-term solutions, they would significantly improve the capacity and mode share or trips heading to and from special events in the area. However, one additional recommendation would be to consider shifting the proposed alignment of the downtown loop to run along the N Street corridor instead of the I Street corridor, due to the distances between the various stadiums / event venues and the Green Line. In addition, a station at The Wharf would be recommended to supplement the Waterfront station.

