



**ANACOSTA METRORAIL STATION:
JOINT DEVELOPMENT ANALYSIS**



FINAL REPORT

Washington Metropolitan Area Transit Authority

January 2016

Prepared by:



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1. Purpose of Study

The purpose of the Anacostia Joint Development Analysis is to assess opportunities and demonstrate overall feasibility for transit-oriented development at the Anacostia Metrorail Station on the Green Line in the District of Columbia. Metro evaluated potential Anacostia Metrorail Station improvements identified by the District of Columbia in previous planning studies which included new residential development, and improved pedestrian and bike access. The analysis focused on Metro-owned property at the South Metro Entrance (South Metro Entrance site) and evaluated opportunities for joint development in the context of existing site utility constraints, transit needs, and nearby planned redevelopment and infrastructure.

To comprehensively assess opportunities for and feasibility of joint development at the South Metro Entrance site, the following tasks were completed by Metro:

- Evaluation of available market data (see **Appendix A**) and recommendations for land use;
- Review of zoning and planning documents for land use intensities and community needs;
- Coordination of infrastructure improvements with the District Department of Transportation (DDOT);
- Assessment of existing and future transit needs, and Metro's needs for bus access;
- Mapping of underground utilities and infrastructure, and engineering scan (see **Appendix B**);
- Preparation of test-fit studies to demonstrate impacts of development; and
- Visualization of bridge improvements (see **Appendix C**) and cost estimates (see **Appendix D**).

This report contains the following sections, and concludes with Metro's concepts for improvements at the South Metro Entrance site in **Section 5**:

- **Section 2:** Description of Station Site
- **Section 3:** Community Context
- **Section 4:** Joint Development Analysis
- **Section 5:** Bridge and Improvement Concepts

2. Description of Station Site

The Anacostia Metrorail Station has two entrances, one at the north end of the station platform and one at the south end. The South Metro Entrance site at the Anacostia Metrorail Station is approximately 3.17 acres in size (**Figure 2-1**) and is the main pedestrian and bike access point for passengers coming from the surrounding neighborhood. Pedestrians can access the South Metro Entrance from Howard Road and Martin Luther King Jr. Avenue. However, the topography along the south edge of the site (between Suitland Parkway and Metrobus facilities) prohibits pedestrian access from the south.

The South Metro Entrance site also serves high volumes of bus and shuttle transfers accessing the site from Howard Road and Martin Luther King Jr. Avenue. General vehicular traffic is not permitted at the site and drivers utilize the curb along Howard Road as an unofficial Kiss & Ride.

Figure 2-1: Potential Joint Development Parcel at Existing South Metro Entrance



Metrobus facilities partially overlie adjacent federal land, which borders Metro's property along Suitland Parkway and Firth Sterling Avenue. The United House of Prayer for all People owns land immediately east of the South Metro Entrance site.

3. Community Context

The Anacostia Metrorail Station is located in the District of Columbia's Anacostia neighborhood. Nearby cultural resources include Historic Anacostia, the Frederick Douglass National Historic Site, and Anacostia Park along the Anacostia River. The communities surrounding the South Metro Entrance site include a combination of single- and multi-family housing, with limited neighborhood-serving retail options. There has been recent planning and revitalization momentum in and around Anacostia.

The 2006 Anacostia Transit Area Strategic Investment Plan (Small Area Plan), shown in **Figure 3-1**, recommended medium-density, mixed-use development along Martin Luther King Jr. Avenue. Nearby, Barry Farm is slated for redevelopment with 1,500 mixed-income residential units, 58,730 square feet of retail, and a park. Currently a Small Area Plan and Environmental Impact Statement are being prepared for Poplar Point to revitalize and preserve National Park Service land with mixed-use development along the Anacostia River. In addition, a half-mile south of the South Metro Entrance site, the Department of Homeland Security's relocation to St. Elizabeth's West Campus is in development, and St. Elizabeth's East Campus is slated for mixed-use development including a new professional basketball facility.

Major infrastructure investments including the Anacostia Streetcar Extension and the South Capitol Street Corridor Project are also currently in the planning stages, which will better connect the existing Anacostia community, as well as major planned redevelopments like Barry Farm, St. Elizabeth's and Poplar Point.

Figure 3-1: 2006 Small Area Plan Framework



Source: DC Office of Planning, Small Area Plan

The following is an overview of market data and key planning efforts related to the South Metro Entrance site.

3.1 Market Assessment

A high level market overview was completed in 2014 as part of Metro’s evaluation for transit-oriented development at the South Metro Entrance site. The area surrounding the Anacostia Metrorail Station is less racially diverse and younger compared to the District as a whole, and has a lower household income with lower than average per household spending.

Demographics surrounding the Anacostia Metrorail Station are shown in **Table 3-1**:

Table 3-1: Anacostia Metro Station Demographics

	Anacostia Metro Station Demographics
	<i>1 Mile Radius</i>
Population	18,125
Households (HH)	6,265
Average persons per HH	2.61
Average HH Income	38,999
Median HH Income	31,800
Employment (i.e. number of employees)	25,557

Source: 2010 Census and MWCOG Round 8.2 2013 Cooperative Forecasts

Metro’s market overview included the following key findings for the South Metro Entrance site:

- **Office:** There is 160,000 square feet in the near term in Ward 8; therefore, multi-tenant speculative office space is not a recommended use in the near term;
- **Residential:** There is a need and precedent for affordable and subsidized housing; however, this use would make revenue generation for Metro challenging; and
- **Retail:** Given the planned retail development in the area (at Barry Farm, Poplar Point, etc.), it is recommended to focus on smaller, neighborhood-supporting space (restaurants, services, convenience stores).

An overview of the Metro’s market assessment can be found in **Appendix A**.

3.2 Anacostia Transit Area Strategic Investment Plan (Small Area Plan)

The Small Area Plan, approved by Council in 2006, recommended a Metro Node with a civic focus at the South Metro Entrance site. Small Area Plan development concepts included modest ground floor retail, and improvements to pedestrian paths to make the transit station more accessible. The Small Area Plan identified two redevelopment scenarios at the South Metro Entrance site. Option A, shown in **Figure 3-2**, proposed over 300 residential units and 27,000 square feet of new retail, and Option B, shown in **Figure 3-3**, proposed 56 residential units and 8,000 square feet of new retail.

The Small Area Plan acknowledged engineering and operational constraints when considering future development. As demonstrated by Metro’s Joint Development Analysis described in **Section 4**, limited Metro property, below grade utilities and tunnel elements, residential parking

requirements, and required transit operations would effectively prevent full implementation of Option A and Option B.

Figure 3-2: Option A from 2006 Small Area Plan



Source: DC Office of Planning, Small Area Plan

Figure 3-3: Option B from 2006 Small Area Plan



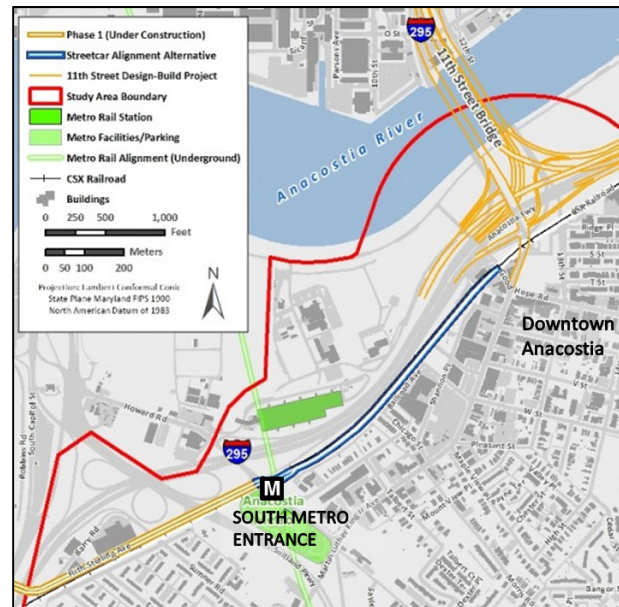
Source: DC Office of Planning, Small Area Plan

3.3 Anacostia Streetcar Extension Environmental Assessment

The proposed Anacostia Streetcar Extension continues the Anacostia Initial Line, between Joint Base Anacostia-Bolling and the Anacostia Metrorail Station, to downtown Anacostia.

The recommended alignment from the 2014 *Anacostia Streetcar Extension Environmental Assessment*, shown in blue in **Figure 3-4**, extends northeast from Howard Road and Firth Sterling Avenue adjacent to the South Metro Entrance site, continuing along the CSX railroad to Good Hope Road.

Figure 3-4: Recommended Streetcar Alignment



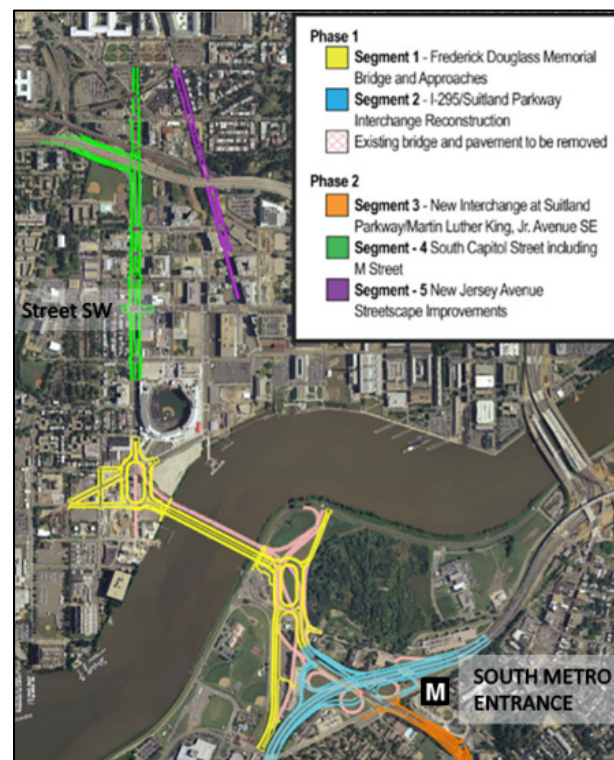
Source: District Department of Transportation, Streetcar Website

3.4 South Capitol Street Corridor Project for Phase 1 and Phase 2 Infrastructure

The South Capitol Street Project, slated to begin construction in 2016, includes reconstruction of the South Capitol Street Bridge and the I-295/Suitland Parkway Interchange, directly adjacent to the South Metro Entrance site as shown in **Figure 3-5**.

Enhancements to pedestrian and bicycle facilities near the site will be completed as part of Phase 1 and Phase 2 improvements listed in **Figure 3-5**.

Figure 3-5: South Capitol Street Improvements



Source: District Department of Transportation, AWI Website

4. Joint Development Analysis

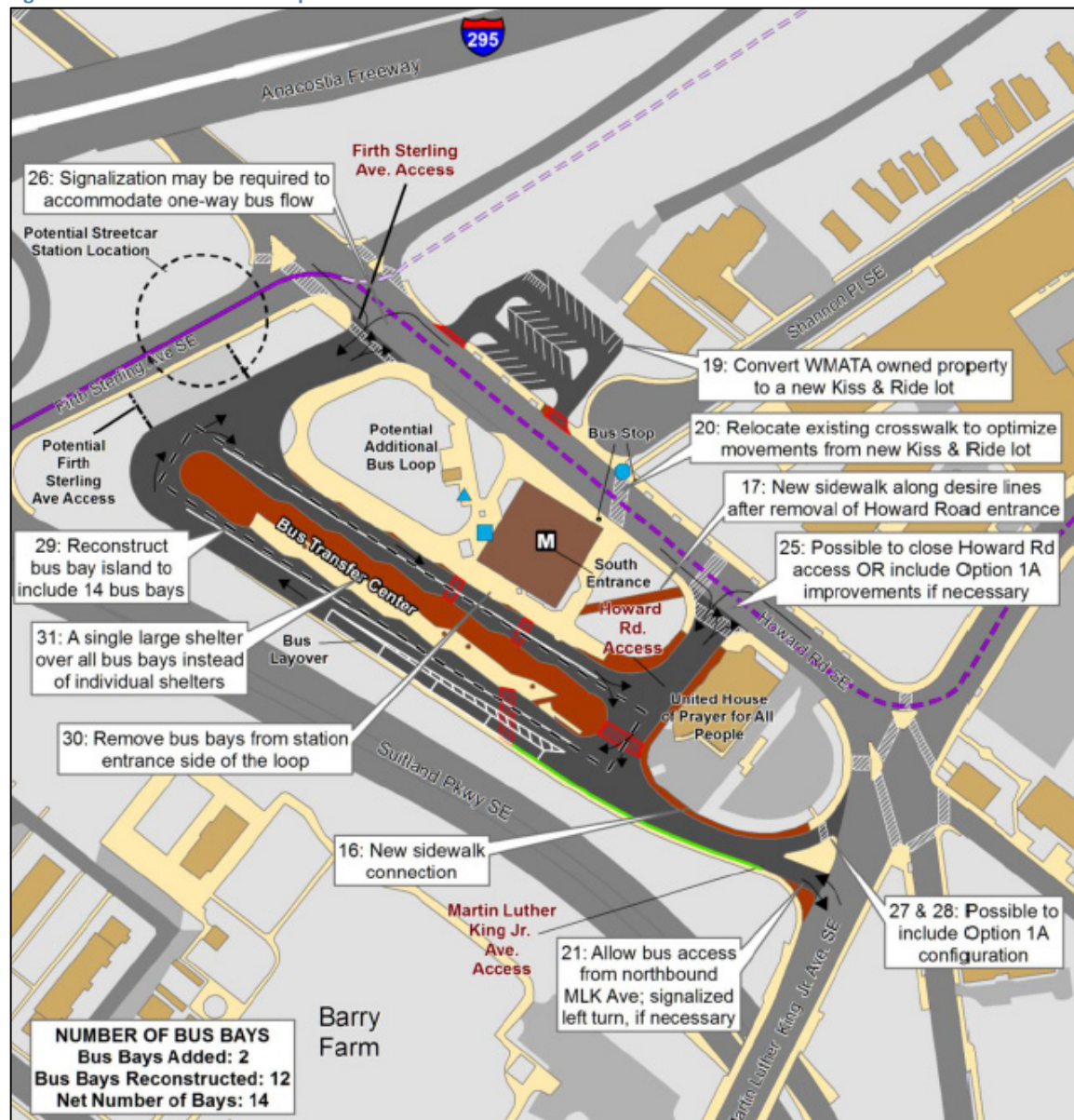
To determine the feasibility of joint development and station improvements, Metro reviewed facility needs and evaluated existing site constraints at the South Metro Entrance site.

4.1 Required Transit Operations

The following transit operations summary is from Metro's *2012 Anacostia/Congress Heights/St. Elizabeth's Station Access Plan*. The Bus Bay Facility at the South Metro Entrance site is extremely busy, with 14 routes providing service to the station during the peak period. The facility is a major bus-to-bus transfer center for Metrobus. During the morning peak hour (7:00 -8:00 AM), there are 70 scheduled arrivals at the station. Many of the bays have a high volume of scheduled arrivals of six or more. In 2010, the Anacostia Metrorail Station had 7,335 Metrorail riders per day, which is expected to grow to 9,829 by 2020 and to 16,984 by 2040. Note that according to Anacostia Metrorail Station faregate data, average daily boarding's totaled 7,260 riders per day in October 2014.

To accommodate future growth and provide more efficient bus operations, Metro's *2012 Anacostia/Congress Heights/St. Elizabeth's Station Access Plan* recommended an option for a 14-bay bus center island with clockwise circulation as shown in **Figure 4-1**, as well as a one-way directional option with two sets of parallel bays accommodating 14 bays. Neither Option A nor Option B of the 2006 Small Area Plan described in **Section 3.2**, would be implementable with Metro's preferred center island bus circulation option.

Figure 4-1: Metro's Preferred Option from the 2012 Station Access Plan



Source: Metro 2012 Station Access Plan (Note that #19 is no longer accurate, and owned by the District)

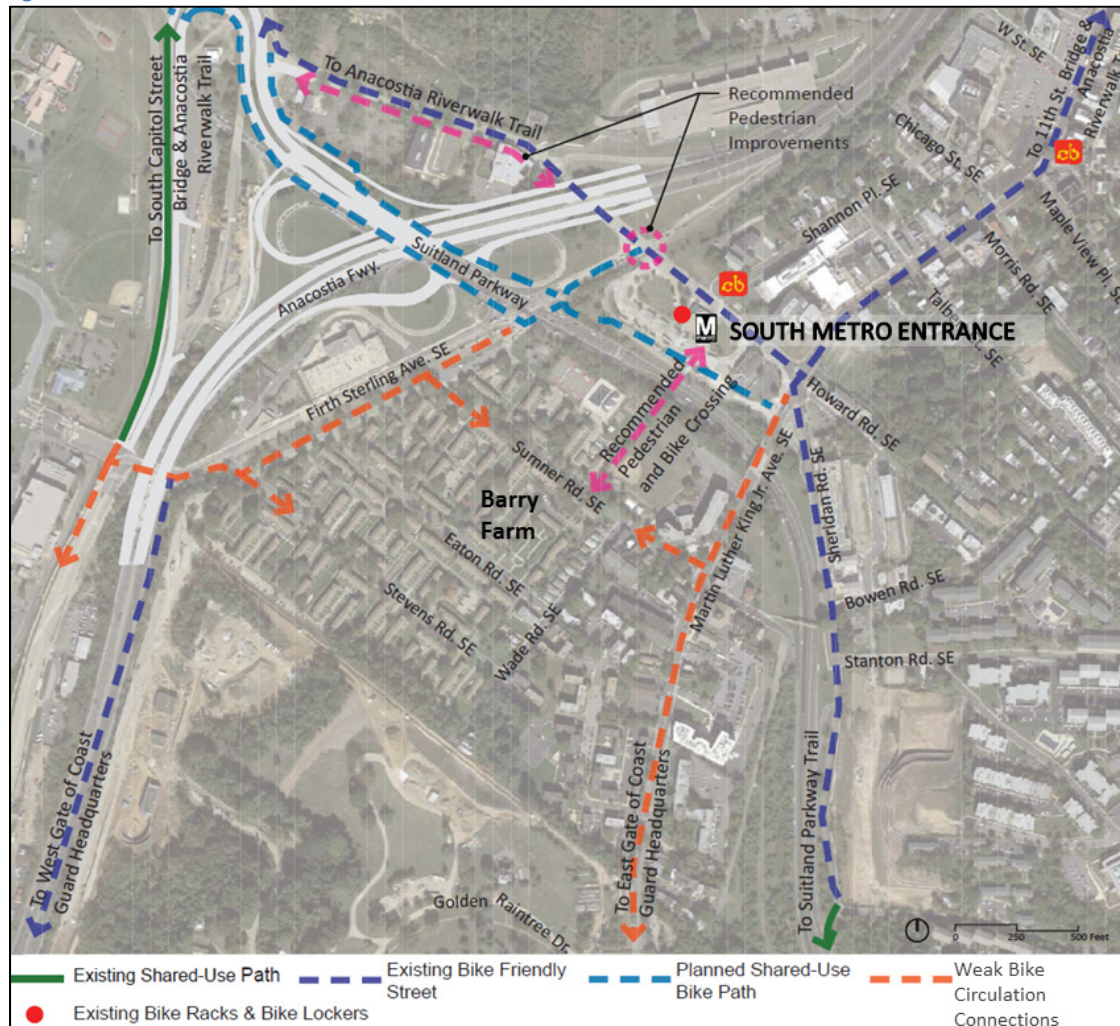
4.2 Pedestrian and Bicycle Access

The following pedestrian and bicycle access summary incorporates feedback from DDOT and from Metro's 2012 Anacostia/Congress Heights/St. Elizabeth's Station Access Plan.

Figure 4-2 provides an overview of pedestrian and bike facilities around the South Metro Entrance site. As identified in previous planning efforts, pedestrian connections between the South Metro Entrance site and neighborhoods to the south, across Suitland Parkway, are very limited. Consideration should be given to improved pedestrian and bike connections to Barry Farm and other communities. There are also opportunities to improve pedestrian access at the intersection

of Firth Sterling Avenue and Howard Road, and to the Anacostia Riverwalk Trail along Howard Road.

Figure 4-2: Pedestrian and Bike Access



4.3 Constraints Overview and Test Fits

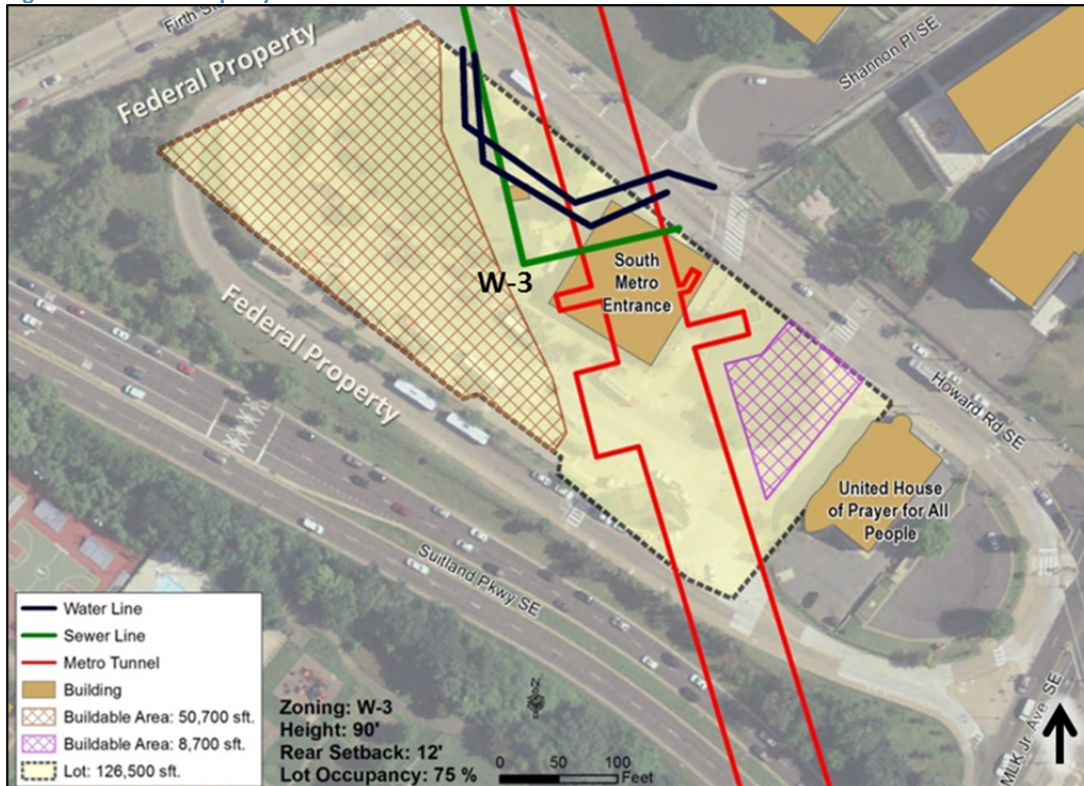
The proposed joint development parcel at the South Metro Entrance site is zoned W-3, which allows for high-density residential, commercial, and certain types of light industrial development. The United House of Prayer for All People site and federal land along Firth Sterling Avenue and Suitland Parkway, currently used by Metro for bus operations, are not available for development purposes.

The site is also constrained by large underground utilities and facilities (see **Appendix B**), including:

- 30" Water Pipes
- 27" Sanitary Sewer Pipes
- Shallow Metro Tunnel with Limited Cover

Figure 4-3 identifies the underground utilities, the Metro tunnel and remaining potential buildable areas on Metro’s property. As shown below, the bulk of the larger 50,700 square foot buildable area and portions of the 8,700 square foot buildable area overlap with required transit operations described in **Section 4.1**.

Figure 4-3: Metro Property and Constraints Overview

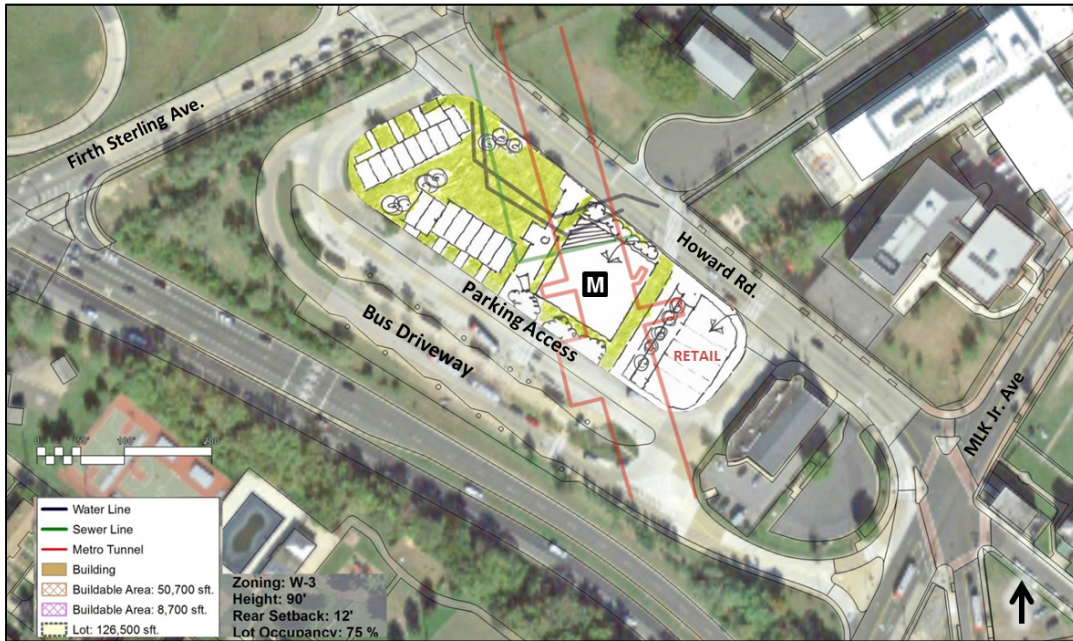


While it is technically feasible to construct development over the shallow Metro tunnel and to relocate major utilities, the cost to do so is considered prohibitive. Therefore, Metro did not evaluate a development overbuild option (high density residential with underground parking) due to added cost feasibility and access difficulties. However, this could be analyzed in the future if there is developer interest.

As part of this joint development analysis, Metro evaluated a series of “test fits” on the buildable areas shown above, including low-rise townhomes and mid-rise multi-family buildings, shown in the following figures.

The low-rise townhome scheme (**Figure 4-4**) orients residential units toward a central green along Howard Road, and provides a retail building east of the South Metro Entrance. Residential parking would be accessed from a separate driveway parallel to the bus driveway.

Figure 4-4: Low-rise townhome “test fit”



Similarly, the mid-rise multi-family scheme (**Figure 4-5**) is oriented toward a central green along Howard Road SE. Retail is provided at the ground level of the residential building, and east of the South Metro Entrance. Residential parking would be provided underground and accessed from a driveway parallel to the bus loop as shown in **Figure 4-6**.

Figure 4-5: Mid-rise multi-family “test fit”

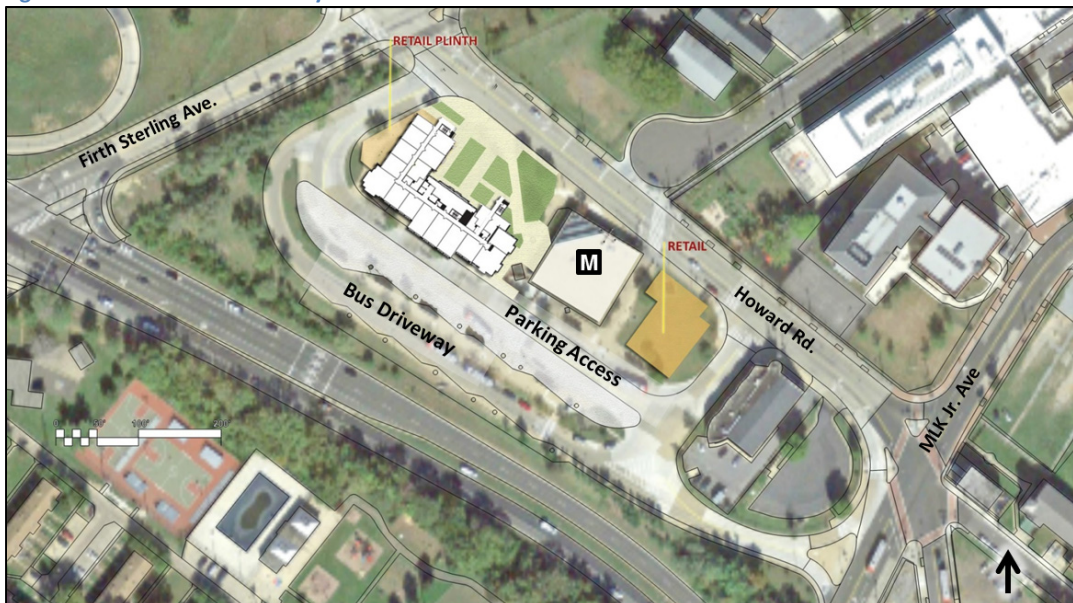
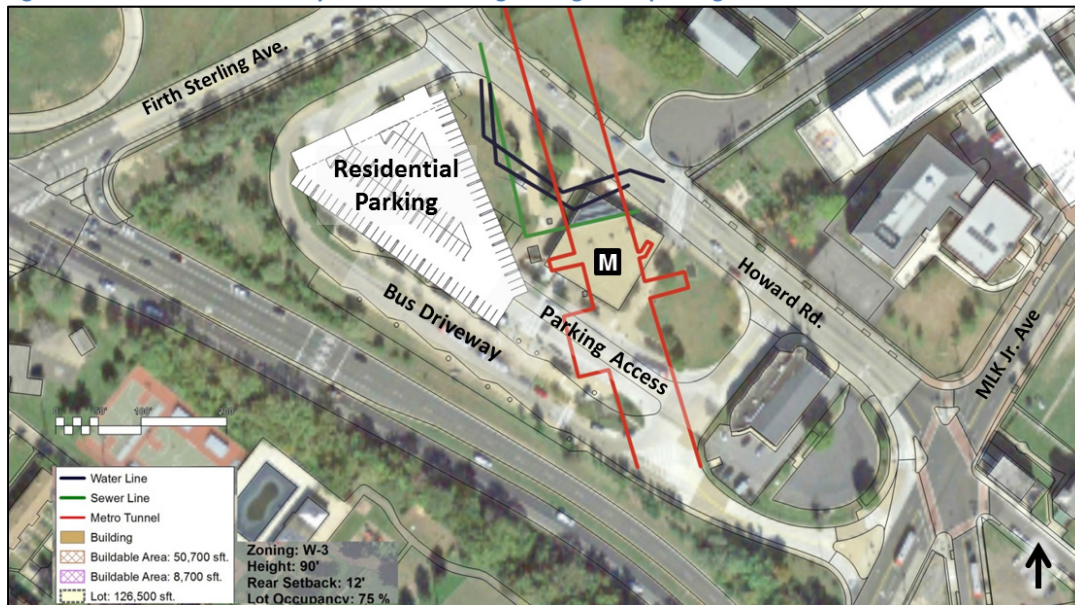


Figure 4-6: Mid-rise multi-family “test fit” showing underground parking



These “test fits” were evaluated by Metro, and it was determined that both low-rise townhomes and multi-family schemes would create traffic conflicts between buses and residential parking access in Metrobus’ primary circulation areas. In addition, the 14-bay bus center island with clockwise circulation option in the *2012 Anacostia/Congress Heights/St. Elizabeth’s Station Access Plan* requires two Metrobus driveways from Howard Road and one driveway from Martin Luther King Jr. Avenue, precluding additional dedicated residential parking access driveways from either street.

After a review of both development and transit needs, Metro concluded that joint development is not viable at the South Metro Entrance site for the following reasons:

- High development costs associated with building over the shallow Metro tunnel, on top of major utilities, or over existing bus facilities; and
- Development conflict with demanding transit operations at the Anacostia Metrorail Station, as well as planned improvements in the *2012 Anacostia/Congress Heights/St. Elizabeth’s Station Access Plan* described in **Section 4.1**.

5. Bridge and Improvement Concepts

Based on the need for additional pedestrian connectivity recommended by the 2006 Small Area Plan (**Figure 3-1**) and identified in **Figure 4-2**, Metro prepared a series of concepts (see **Appendix C**) which include new infrastructure, neighborhood amenities, and placemaking enhancements that could be constructed by others using Metro’s property.

The South Metro Entrance site presents a unique opportunity to enhance access between the future development at Barry Farm and the Anacostia Metrorail Station. By leveraging multi-modal infrastructure investments like the Anacostia Streetcar Extension and South Capitol Street Corridor

Project, there is sufficient buildable area on Metro’s property to accommodate a bridge between the South Metro Entrance site and Barry Farm for pedestrians and bicyclists.

Metro developed three bridge connection concepts for pedestrians and bicyclists across Suitland Parkway to respond to current and future connectivity needs. Each of the proposed schemes provide safe pedestrian and bicycle connections, while blending community and Metro functionality. All three concepts would include facilities like a police station, supervisor room, and operator restrooms as well as community facilities like neighborhood-serving retail and community rooms. In all three concepts, due to vehicular access constraints, parking would need to be excluded for neighborhood-serving retail uses. An overview of bridge concepts and improvements are described below (**Table 5-1**), and common features are shown in **Figure 5-1** and **Figure 5-2**.

Table 5-1: Overview of Concepts and Improvements

Overview of Concepts and Improvements	
Pedestrian and Bike Bridge Concepts	
Concept A	Utilitarian Bridge
Concept B	Green Wave Signature Bridge
Concept C	Anacostia Gateway Bridge
Improvement Features common to Concepts A-C	
Retail Building	<ul style="list-style-type: none"> • Standalone 6,000 square feet building located east of the South Metro Entrance and along Howard Road with neighborhood-serving retail. • Parking is not provided due to vehicular access constraints and conflicts with buses. • Commercial loading and trash collection would be located on Howard Road.
Atrium	<ul style="list-style-type: none"> • Located at the base of the bridge includes flexible community space, retail spaces and a police station visible from Howard Road and the busway. This space could also be utilized for Metro’s Bike & Ride program. • Features walkthrough passageway (clear visual connectivity) from Firth Sterling and Howard Road to the South Metro Entrance and busway. • Commercial loading and trash collection would be located on Howard Road.
Busway and Island	<ul style="list-style-type: none"> • Requires 14-bay bus center island recommended in Metro’s 2012 Anacostia/Congress Heights/St. Elizabeth’s Station Access Plan and bus boarding area canopies. • Features access from the bridge via a set of elevators and a stairway, and includes a supervisor room and operator restrooms at the base of the bridge.
Landscaping	Located along bridge structure and adjacent to the community atrium, includes lighting, landscaping and shade trees.

Figure 5-1: Bridge connection to planned development at Barry Farm



Figure 5-2: Improvements including Atrium, Retail Building, 14-Bay Bus Island, and Landscaping



The three concepts shown in **Figure 5-3 to Figure 5-13** are rooted in the following goals:

- Provide easy and safe access for both pedestrians and bicyclists to transit, and reconnect a neighborhood divided by traffic arteries;
- Develop infrastructure on a constrained property site to support and encourage transit-oriented development on adjacent sites;
- Create pedestrian-friendly community areas that promote socializing and traditional neighborhood character; and
- Incorporate neighborhood-serving retail and community-focused uses.

5.1 Utilitarian Bridge

Concept A: Simple Bridge Structure

The proposed bridge structure in Concept A creates an elevated urban path with separated zones for pedestrian and bicyclists. The separation is accomplished through an elevation change and continuous green planting area, doubling as a storm-water capture facility. Retail and enclosed common areas, that can double as community space, are integrated with the bridge support and landing areas. The interior and exterior spaces of the atrium provide clear visual connectivity for pedestrians. Concept A also features direct and easy access to both the South Metro Entrance and the transit bays via a set of elevators and a stairway. The design will aim to encourage continuous pedestrian and bicycle activity, while not promoting social gathering on the bridge.

Figure 5-3: Concept A, showing bridge landing and atrium



Figure 5-4: Concept A, looking south toward Barry Farm redevelopment from bridge



Figure 5-5: Concept A, cut view showing atrium with retail, police station and flexible community space

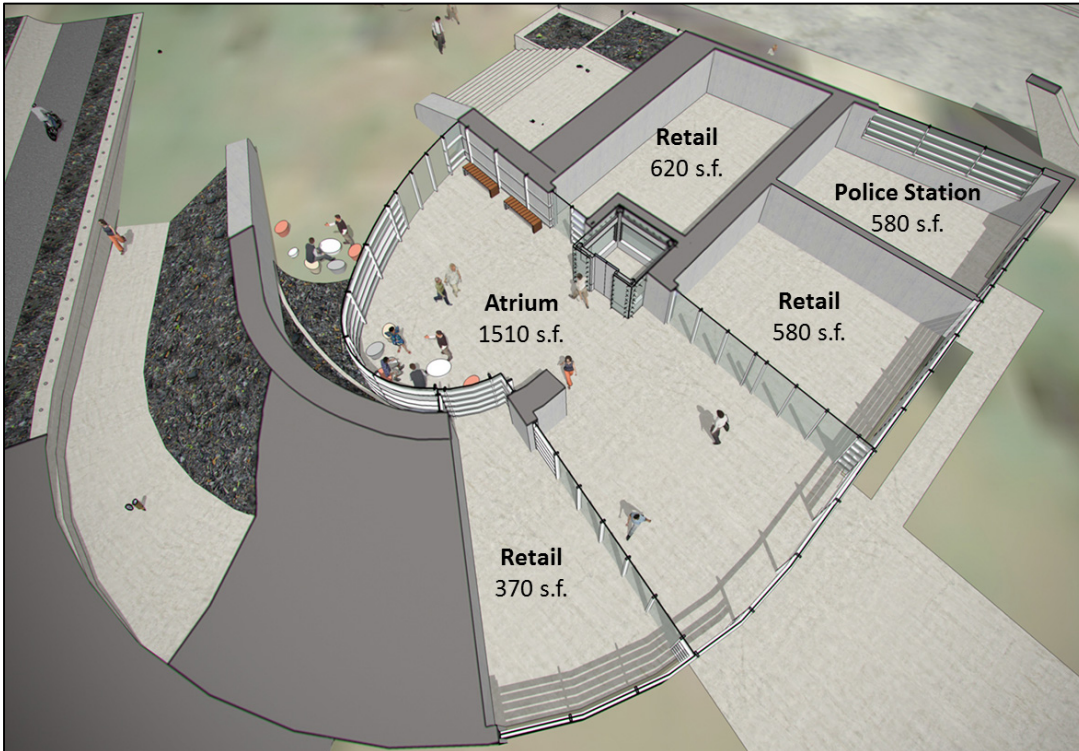


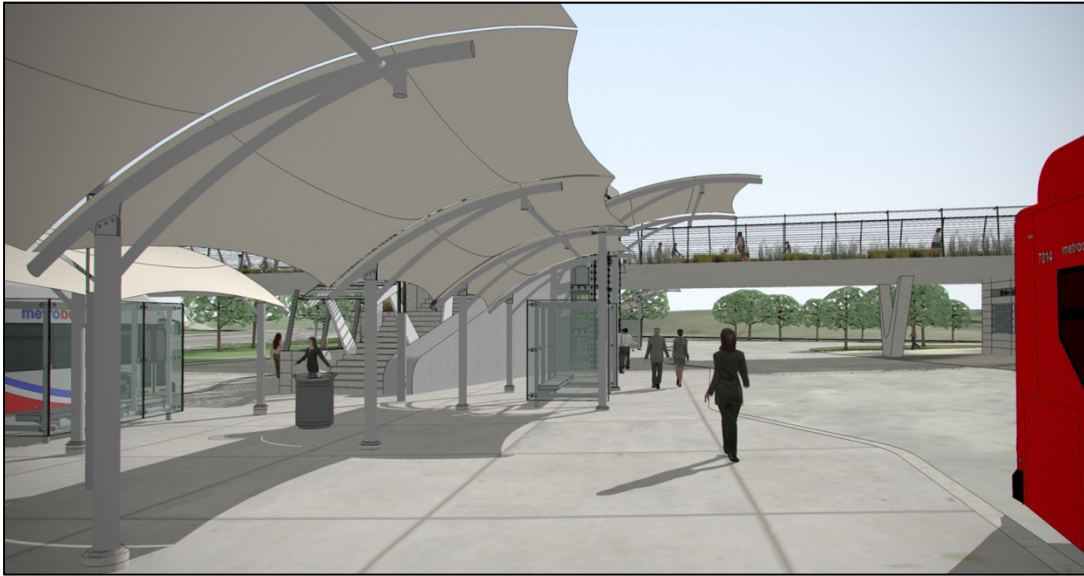
Figure 5-6: Concept A, showing atrium with flexible community space



Figure 5-7: Concept A, Howard Road retail and street frontage



Figure 5-8: Concept A, showing bus boarding area



5.2 Signature Bridge Concepts

Two concepts were prepared in which the bridge would be treated as a signature design element, one that would provide a strong visual presence for pedestrians, transit patrons, and motorists. Historically, the pedestrian bridges connecting to Metro’s stations serve a utilitarian purpose. Typically, Metro would not consider a pedestrian bridge that visually dominates the adjacent station entrance. However, it is expected that the bridge would be implemented by others, and that this location may warrant a more prominent design.

Concept B: Green Wave Signature Bridge

Similar to Concept A, Concept B features an elevated urban path with functionally separated zones for pedestrians and bicyclists. The shell of the bridge is inspired by the distinct Metro tunnel design with its signature geometry. The “Green Wave” superstructure element would function as a safety enclosure, required for this elevated pedestrian structure, and would offer shade in the summer months. This “Green Wave” design would be a unique neighborhood landmark.

Figure 5-9: Concept B, showing landmark view along Suitland Parkway



Figure 5-10: Concept B, Site plan

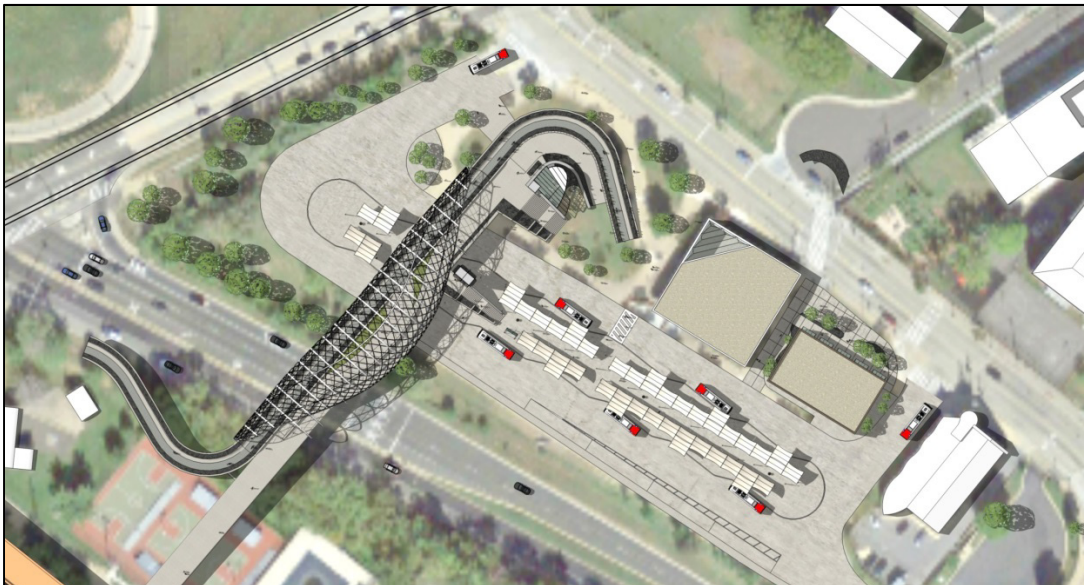


Figure 5-11: Concept B, showing connection to transit



Concept C: Anacostia Gateway Bridge

A signature structure representing a river wave is proposed to support –through suspension –the sculpted urban path connecting the Barry Farm development with the South Metro Entrance in Concept C. The structure would be visible from a distance, and could be an opportunity to serve as a gateway to the District of Columbia and Anacostia. The overall development solution offers benefits similar to Concepts A and B.

Figure 5-12: Concept C, showing gateway view along Suitland Parkway



Figure 5-13: Concept C, looking north toward South Metro Entrance from bridge



5.3 Order of Magnitude Cost Estimates for Bridge and Improvement Concepts

Order of magnitude construction cost estimates were prepared for Concepts A, B, and C using current dollars. Costs include base construction, sales tax, contractor mark-up, subcontractor mark-up and allocated contingency, and Design-Bid-Build project delivery.

Improvement Features common to Concepts A-C are not included in Bridge Structure Costs (see **Table 5-2**), and are to be treated as additional costs.

Table 5-2: Order of Magnitude Capital Cost Estimates (2015 Dollars)

Estimated 2015 Costs	
Bridge Structure Order of Magnitude	
Concept A	\$18 – \$19 million
Concept B (conceptual costs)	\$23 – \$25 million
Concept C (conceptual costs)	\$27 – \$30 million
Improvement Features common to Concepts A-C	
Retail Building	\$1.7 – \$1.8 million
Atrium	\$2.1 – \$2.2 million
Busway and Island	\$4.9 – \$5.2 million
Landscaping	\$1.1 – \$1.3 million

The total cost (including construction costs, and soft costs like project development, design, engineering, project management, construction administration, legal/permits, contingency) to implement a new bridge structure and improvement features would range from approximately \$28 million to approximately \$41 million, depending on the selected bridge concept. See **Appendix D** for more information.



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Appendix A: Market Overview



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Anacostia Metro Station Market Overview



Summary

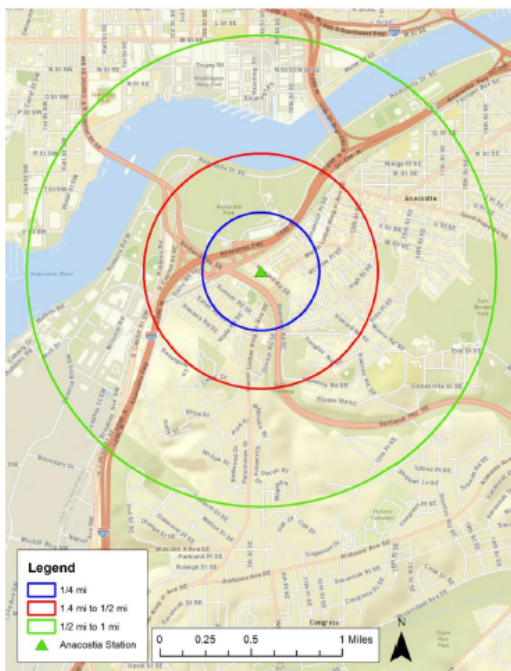
The Anacostia Metro Station site faces distinct challenges:

- Physical separation—It is bounded by major roadways. While this is good for visibility of commercial space, it is a challenge for pedestrian access. Similarly, the topography separates the neighborhood from the site.
- Historic market—The market is thus far “unproven” though there has been recent interest from investors in the area. The market and demographic data that are available for analysis does not indicate a robust opportunity for development
- Competitive planned and under construction projects—There is a pipeline of nearby projects at varying levels of certainty of development that both absorb potential demand and have created a “wait and see” attitude among some investors.

Summary

- The one use with a need and precedent is affordable and subsidized housing. This use, however, would make revenue generation for WMATA challenging
- Although it has battled perception and historic market performance issues described above, Sheridan Station has reported recent success in selling its market rate units (rate of absorption or achieved sales price is unknown)
- There is a significant amount of retail planned nearby—both as a part of the plan for Barry Farm (grocery and neighborhood-serving retail) and at Skyland Town Center (a Walmart, CVS, and other retail). This will satisfy near-term demand for significant retail
- Multitenant speculative office space is not a recommended use in the near term; it is likely that the achievable rents would not support new construction
- The recommended program for near-term development is:
 - Up to 237 units residential
 - Up to 20,000 sf neighborhood-serving retail/restaurants
 - Up to 20,000 sf neighborhood serving office space

Station Area Population and Households



- From 2010 to 2013, the 0 to 1-mile area around the Anacostia Metro Station grew at a rate of 0.67% annually compared to 1.09% in DC. The 1/4-mile radius grew at a rate of 2.39%.
- Households grew at a faster rate than population. In the 1/4-mile radius, households increased at a rate of 4.33 percent annually. Overall, in the 1-mile radius households grew at a rate of 1.19% annually. In DC, they grew by 1.33% annually.

Population and Households (2010-2018)

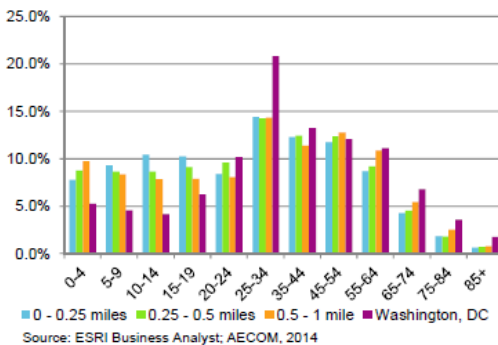
	Total Population			Total Households		
	2010	2013	2018	2010	2013	2018
0 - 0.25 miles	1,008	1,082	1,125	354	402	430
0.25 - 0.5 miles	5,437	5,477	5,879	1,886	1,921	2,091
0.5 - 1 mile	10,050	10,272	11,044	3,588	3,715	4,038
0-1 mile Total	16,495	16,831	18,048	5,828	6,038	6,559
Washington, DC	601,723	621,686	672,312	266,707	277,486	302,868

Source: ESRI Business Analyst; AECOM, 2014

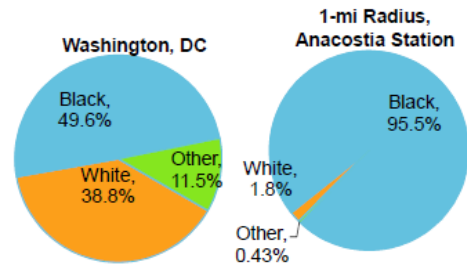
Station Area Demographic Characteristics

- The area around the Anacostia Metro Station is younger on average than Washington, DC as a whole. The median age within a ¼-mile is 27.8; in ¼ to ½ mile 28.7, and ½-1 mi 30.6. Washington, DC has a median age of 34.3. This is attributable to a larger than average share of the population under the age of 18
- The area is also less racially diverse than the District as a whole. While Washington, DC's population is 49.6 percent African-American, 38.8 percent white, and 11.5 percent other races, the one-mile area around the metro station is 95.5 percent African-American

Population by Age, 2013



Comparison of Racial Composition by Geography, 2013



Station Area Income Profile

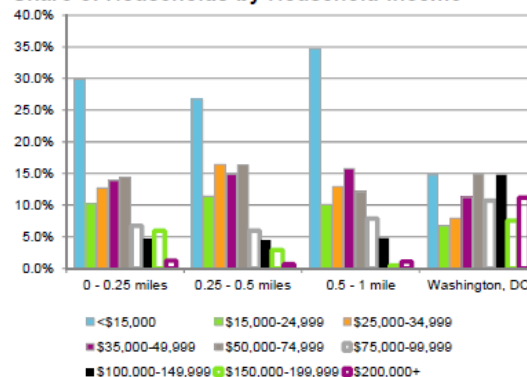
- The area surrounding the Anacostia Metro station has had a disproportionate share of the area's subsidized housing. This is reflected in the households by household income and the lower than average median, average, and per capita incomes.
- 31.8% of households in the 1-mile radius earn less than \$15,000, which is a greater percentage than that of households earning over \$50,000 per year.

Median, Average, and Per Capita Income

	Median HH Income		Avg HH Income		Per Capita Income	
	2013	2018	2013	2018	2013	2018
0 - 0.25 miles	\$32,206	\$39,882	\$51,238	\$59,985	\$18,289	\$21,995
0.25 - 0.5 miles	\$31,542	\$36,415	\$45,460	\$49,863	\$16,278	\$18,052
0.5 - 1 mile	\$28,294	\$30,011	\$41,416	\$44,045	\$16,576	\$17,722
Washington, DC	\$63,342	\$75,781	\$101,735	\$117,842	\$46,014	\$53,589

Source: ESRI Business Analyst; AECOM, 2014

Share of Households by Household Income



Area Developments and Plans

Barry Farm Plan (2006)

- Total 1,110 residential units: 373 replacement; remainder affordable and market rate
- 20,350 sf neighborhood retail, not including a new grocery store

Anacostia Square

- 160,000 sf mixed-use development with 40,000 sf of retail, 80 condominiums, 30,000 sf office, and 198 parking spaces.

City Homes and Lofts at Sheridan Station

- Former Sheridan Terrace housing redevelopment
- Partially completed. Project is being developed in 4 phases, with a total of 344 multifamily units, townhomes, and manor flats.

St. Elizabeth's

- The use of St. Elizabeth's has been a long-awaited and unknown variable for the SE neighborhoods.
- St. Elizabeth's West (the historic campus) is the location of the Coast Guard. The Dept. of Homeland Security's relocation to this site has been planned, but not executed.

- St. Elizabeth's East is planned as a mixed use community. Currently, there is an RFP for a master developer. A multifunctional "G8way DC" pavilion has been established with vendors and event space.

Poplar Point

- No definitive timeline or development plan.
- In the past several years, uses proposed include mixed use development, a DC United stadium, a DHS facility, and FBI Headquarters.

Skyland Town Center

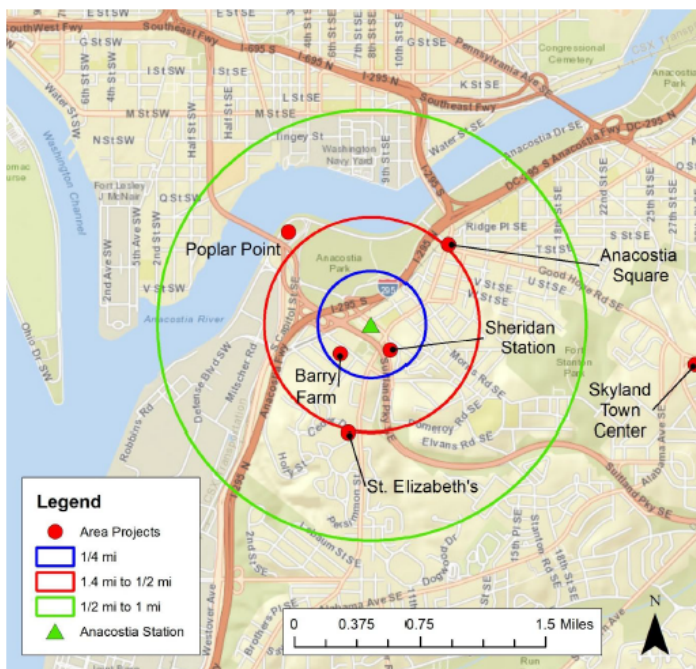
- Broke ground in March 2014
- Over 300k sf retail (including a Walmart and CVS) and 476 residential units

Development Pipeline, Ward 8

Status	Residential Units	Retail Square Feet	Office Square Feet
Under Construction	262	6,000	0
Near Term	488	39,500	160,000
Medium Term	903	82,250	227,350
Long Term	8,779	1,164,330	9,650,150
Total	10,432	1,292,080	10,037,500

Source: WDCEP; AECOM, 2014.

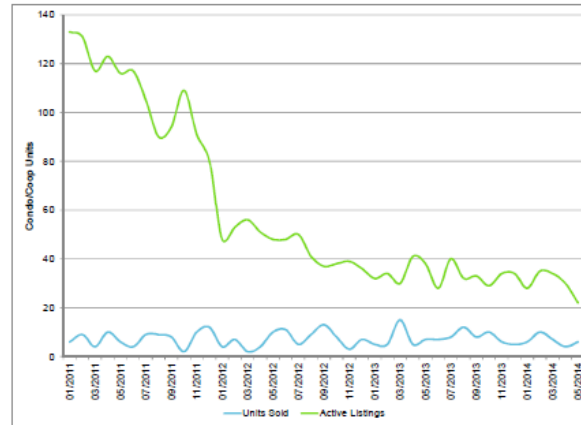
Area Developments and Plans



Residential Resale Trends

- Inventory of active condo/co-op listings has cleared since 2011 but sales pace and pricing low compared to District
 - 4.5 months inventory in ZIP codes 20019, 20020, and 20032
 - Accounted for 2.6% of total sales in DC during 2013
 - Average sales price of \$87,652, 81% less than DC average

Condo/Coop Sales and Inventory, ZIP Codes 20019, 20020, and 20032

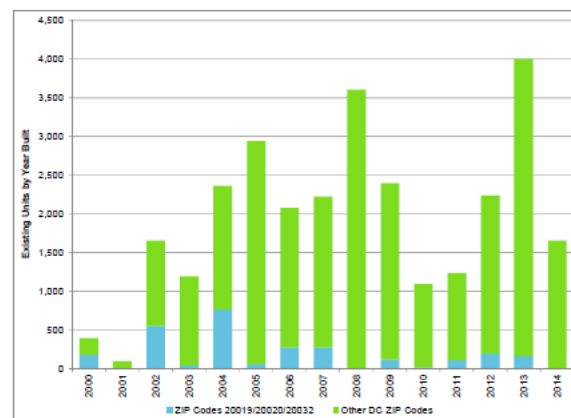


Source: MRIS; AECOM, 2014.

Multifamily Residential Trends

- Large multifamily pipeline in District with expected delivery of 5,750 apartments and 1,500 condos over next 3 years
- ZIP Code 20020 accounted for 3.3% of deliveries from 2000 to 2013
 - Note: Includes non-market rate and senior units
- Recent deliveries include:
 - Lofts at Sheridan Station (114 units)
 - Roundtree Residences (92 units)
 - Nannie Helen at 4800 (70 units)

Multifamily Units by Year Built, DC and ZIP Codes 20019, 20020, and 20032



Source: CoStar; AECOM, 2014.

Residential Pipeline and Demand

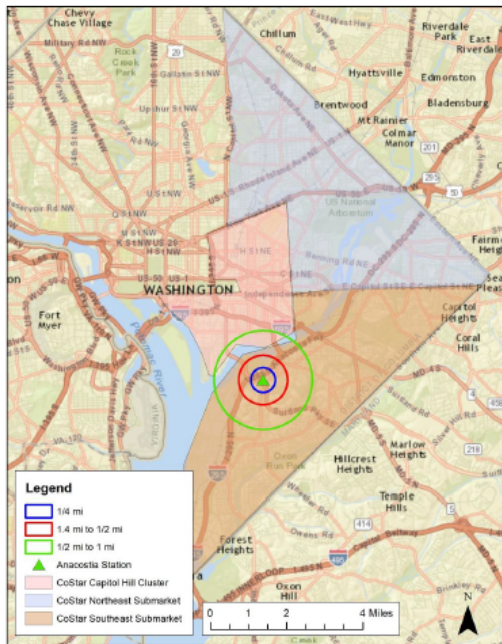
- Based on historic performance, forecast deliveries of 1,965 multifamily units per year in District
- ZIP Code 20020 estimated to capture 643 units over 10 years based on capture from 2000 to 2013
- Near- and medium-term pipeline of 406 to 470 units in ZIP Code
- Remaining demand for 173 to 237 units at station site
- Major long-term projects may significantly affect market dynamics in Anacostia

Proposed Near- and Medium-Term Development Projects, ZIP Code 20020

Name	Status	Residential Units	Retail Square Feet
1708 Good Hope Road	Near Term	188	25,000
Cedar Hill Flats	Near Term	140	14,500
Sayles Place	Near Term	60	
2825 Robinson Place	Medium Term	17	
2836 Robinson Place	Medium Term	16	
Hartford Knolls	Medium Term	16	
Homes at Woodmont (Phase II)	Medium Term	18	
W Street Condos	Medium Term	15	

Source: WDCEP, AECOM, 2014.

Market Analysis Submarkets



- Market analysis compares rings around metro station (1/4-mile, 1/2-mile, and 1-mile) as well as submarkets as defined by CoStar. The station is in the SE Submarket, which is mostly east of the Anacostia river, but includes areas near the Navy Yard

Office Market

- Within a ½-mile of the metro station south entrance, there are 22 buildings containing 377,718 sf. Approximately 1/2 the buildings and 1/3 the sf are within a 1/4-mile.
- The SE submarket has had under 3% of total DC absorption (Avg. 22,245 sf/year).

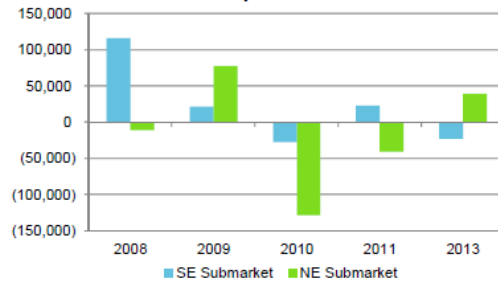
Office Market Summary Data, 2Q to Date

Study Area	# of Bldgs.	Total RBA	Avg. Rental Rate	Avg. Rental Rate
0.25-Mile	11	100,832	0.0%	-
0.5-Mile	22	377,718	0.0%	-
SE Submarket	92	794,401	4.0%	\$26.95
NE Submarket	151	2,566,270	25.7%	\$23.47
Capitol Hill Submarket	453	33,949,327	12.4%	\$48.63
Washington, DC	2,313	151,689,904	10.0%	\$49.67

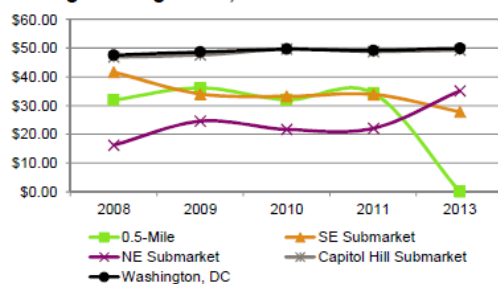
- Rents are full service.
- RBA=Rentable Building Area
- n/a indicates that there were not enough transactions to calculate a rate
- The SE Submarket is inclusive of the 0.5-mile and 0.25-mile areas. The 0.5-mile area is inclusive of the 0.25-mile area.

Source: CoStar Property; AECOM, 2014

Office Direct Net Absorption



Average Asking Rents, 2008-2013



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Office Pipeline & Employment-Driven Demand

- 29,229 new office-using employees in DC between 2014 and 2025
- Growth translates to approximately 5.85 million sf of additional office space by 2025
- SE Submarket has 2.83% of the District's 5-year absorption. At 5% of DC employment-based demand, the SE area could support up to 292,290 sf. The area around the metro has 12.6% of existing
- SE Submarket supply (36,786 sf "fair share")
- Several major planned projects(e.g. Poplar Point, St. Elizabeth's) have the potential to change market dynamics while also absorbing market demand
- At the metro site, only neighborhood-serving office space is recommended in the near term

Employment-Driven Washington, DC Office Space Demand

	2010	2014	2019	2025	2014-2019	2019-2025	2014-2025
Information	20,697	20,633	20,308	19,817	-325	-491	-816
Finance And Insurance	23,385	23,919	24,289	24,569	370	280	650
Real Estate And Rental And Lease	23,444	25,657	26,404	27,321	747	917	1,664
Professional And Technical Services	127,148	132,790	140,548	150,288	7,758	9,740	17,498
Management Of Companies And Enterprises	1,851	1,723	1,812	1,907	89	95	184
Administrative And Waste Services	48,918	50,884	54,570	59,267	3,686	4,697	8,383
Federal Civilian Government	195,925	193,941	195,089	195,607	1,148	518	1,666
Net New Employment					13,473	15,756	29,229
Estimated Employment-Driven Demand (sf)					2,694,600	3,151,200	5,845,800
@ \$200 sf/employee							

Source: Woods and Poole Economics, 2012; AECOM, 2014

Anacostia Metro Station
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AECOM

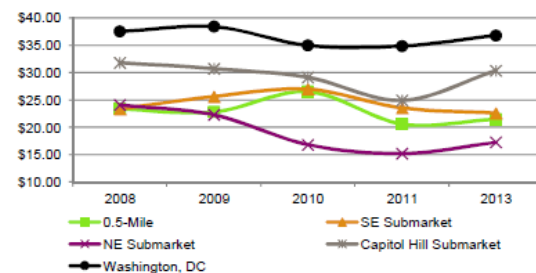
Retail Performance

- Nearly all space in immediate area is on Martin Luther King, Jr. Ave., in small buildings, and was constructed in the early part of the 20th Century
- Existing retail in the SE Submarket with more than 50,000 square feet includes the South Capital Shopping Center (58,883), Penn Branch Center (89,254), Good Hope Marketplace (97,213), and the Shops at Park Village (114,000).
- There are 2 projects listed in CoStar's pipeline—Skyland Town Center which is under construction and will total 342,000 sf and Anacostia Square which is proposed and will total 200,000 sf
- DC DMPED lists 1.3 million sf in planned developments in Ward 8.

Retail Market Summary Q2 2014

Study Area	# of Buildings	Total RBA	Vacancy Rate	Average Rental Rate
0.25-Mile	15	40,214	n/a	n/a
0.5-Mile	53	161,093	6.4%	\$21.25
SE Submarket	290	1,583,925	4.7%	\$22.17
NE Submarket	564	3,275,911	7.4%	\$20.86
Capitol Hill Submarket	726	3,465,353	6.1%	\$35.50
Washington, DC	4,241	22,199,465	4.6%	\$38.05

Average Asking Retail Rents, 2008-2013

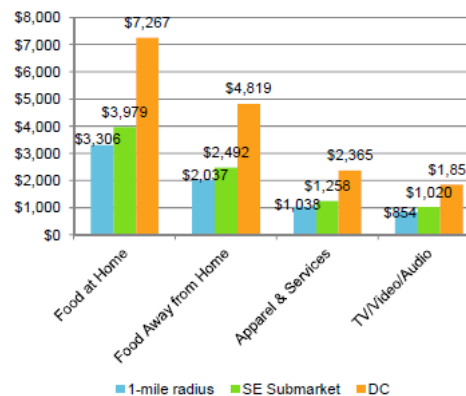


Rents are triple net.
RBA=Rentable Building Area
n/a indicates that there were not enough transactions to calculate a rate
The SE Submarket is inclusive of the 0.5-mile and 0.25-mile areas. The 0.5-mile area is inclusive of the 0.25-mile area.
Source: CoStar Property; AECOM, 2014

Retail Demand & Pipeline

- Existing households within 1 mi have lower-than-average per household spending
- Total spending on retail goods by households within ½ mile of the Anacostia Metro Station is \$51.5 million in 2013. This is estimated to increase by \$4.4 million to \$55.9 million in 2018
- Using the existing ratio of area retail spending to area sf (\$255.92/sf), this increase will translate into an additional 17,158 retail sf.
- Given the planned retail development in the area (Skyland Town Center, future Barry Farm grocery and retail, future Poplar Point development, Anacostia Square), it is recommended to focus on continuing the Martin Luther King, Jr. Ave retail corridor, focusing on smaller, neighborhood-supporting space (several restaurants, services, convenience store).

Resident Retail Spending in Select Categories



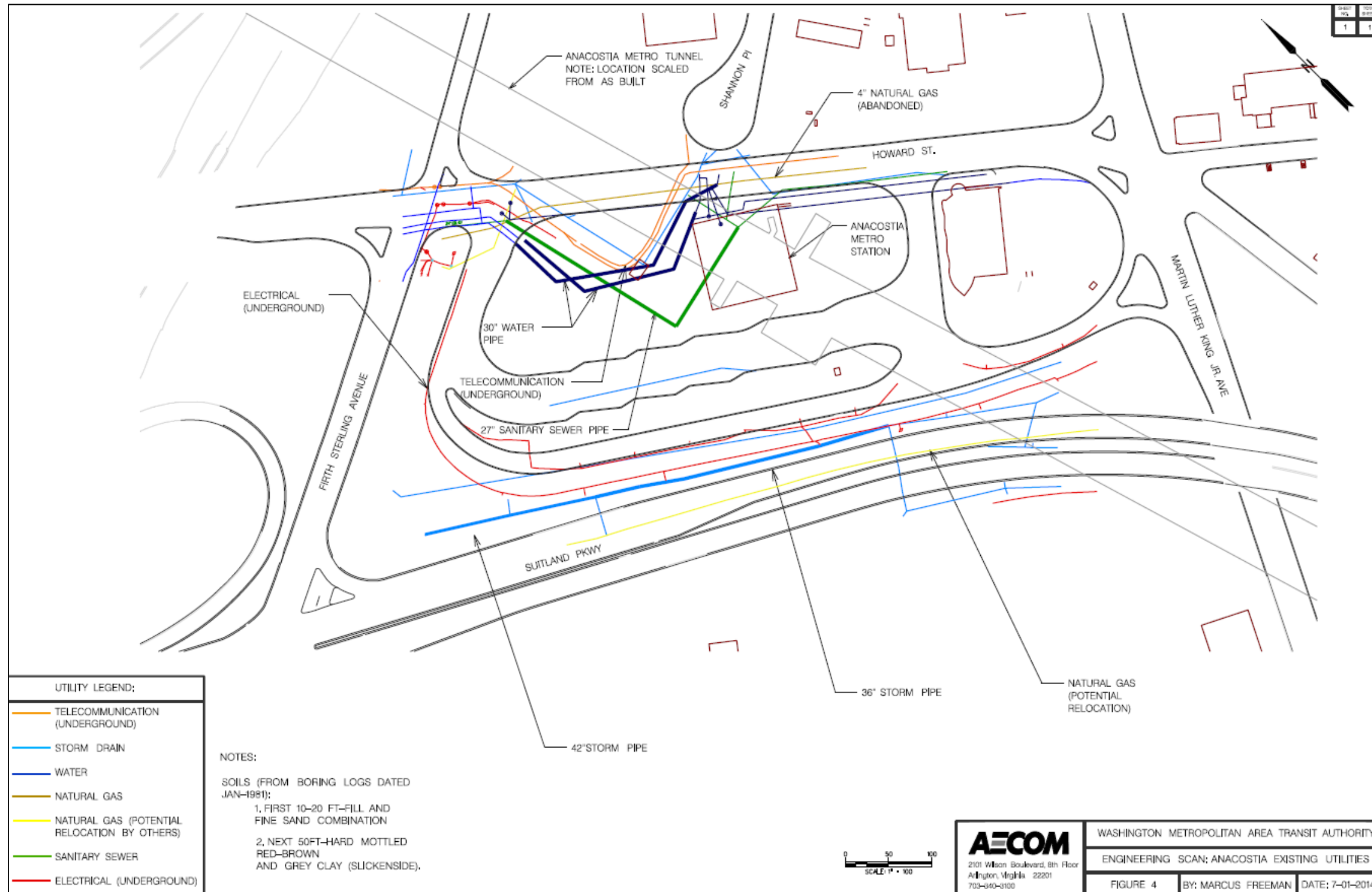
Source: ESRI Business Analyst; AECOM, 2014



Appendix B: Engineering Scan



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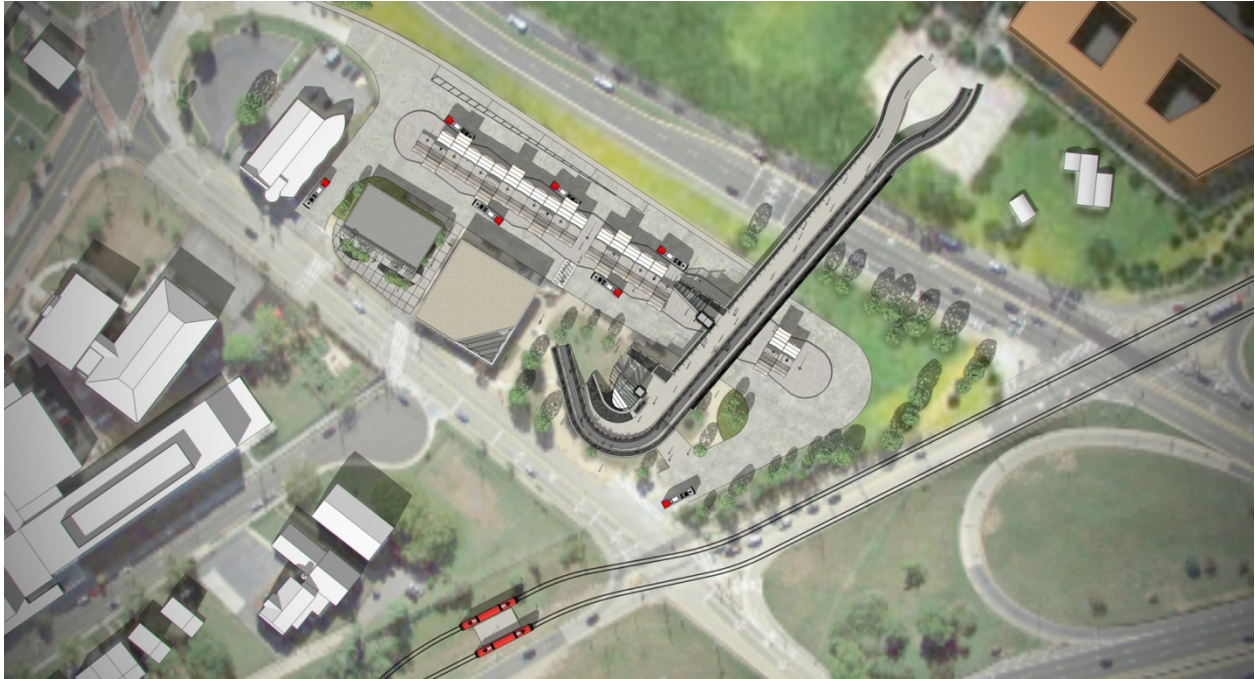
Appendix C: Bridge Concepts



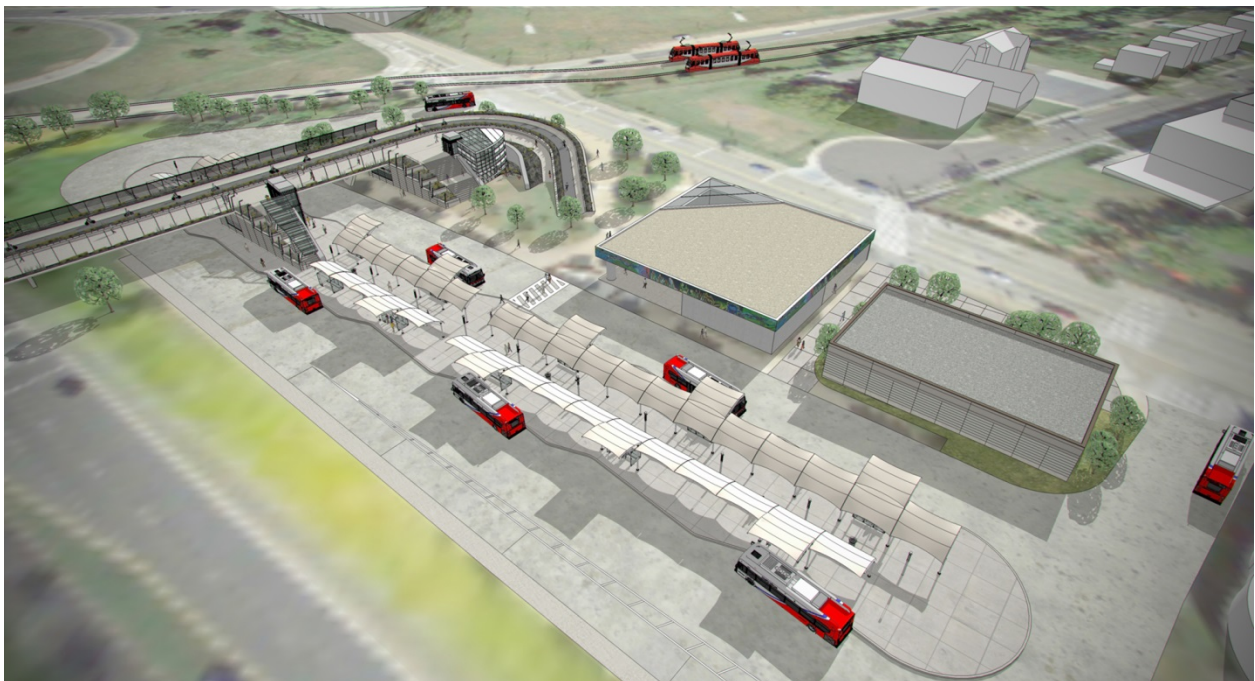
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Bridge Concept Option A

Concepts for illustrative purposes



Plan view, showing bridge connection between Barry Farm and Anacostia Metrorail Station



Looking west, bridge crossing Suitland Parkway



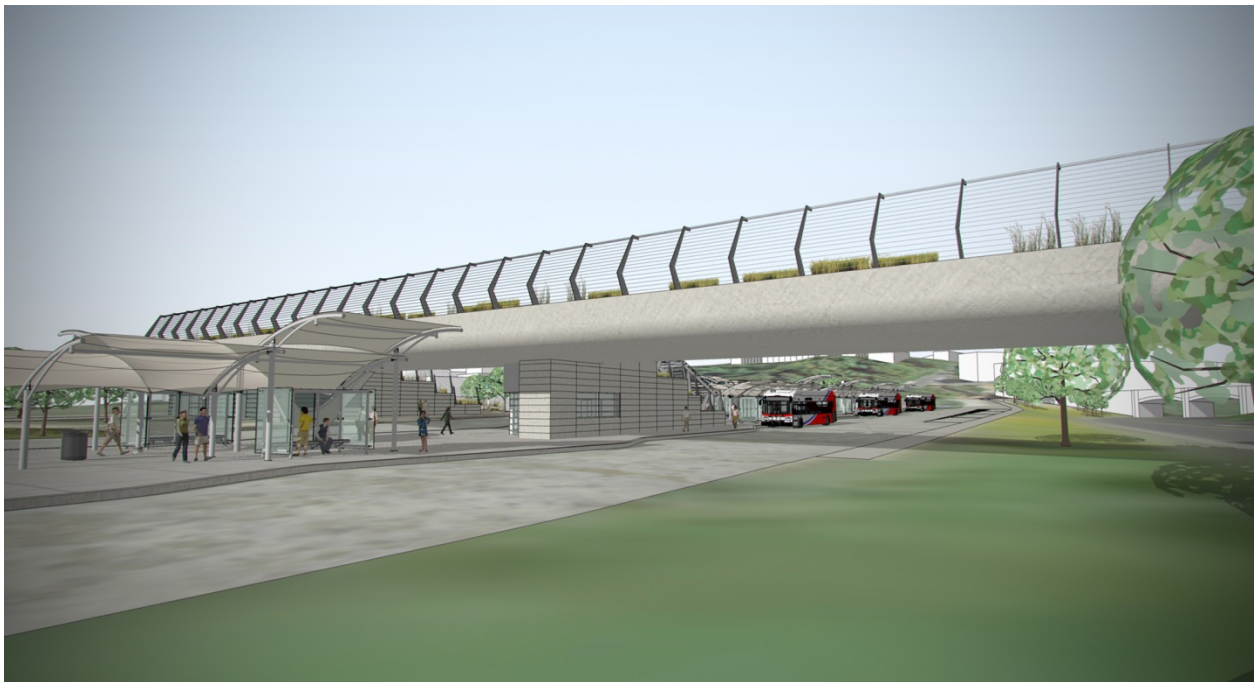
Looking east, showing connection between bridge and bus loop



Looking south, showing connection between bus loop and bridge



Looking south, showing connection between bus loop and bridge



Looking north, showing connection between bus loop and bridge



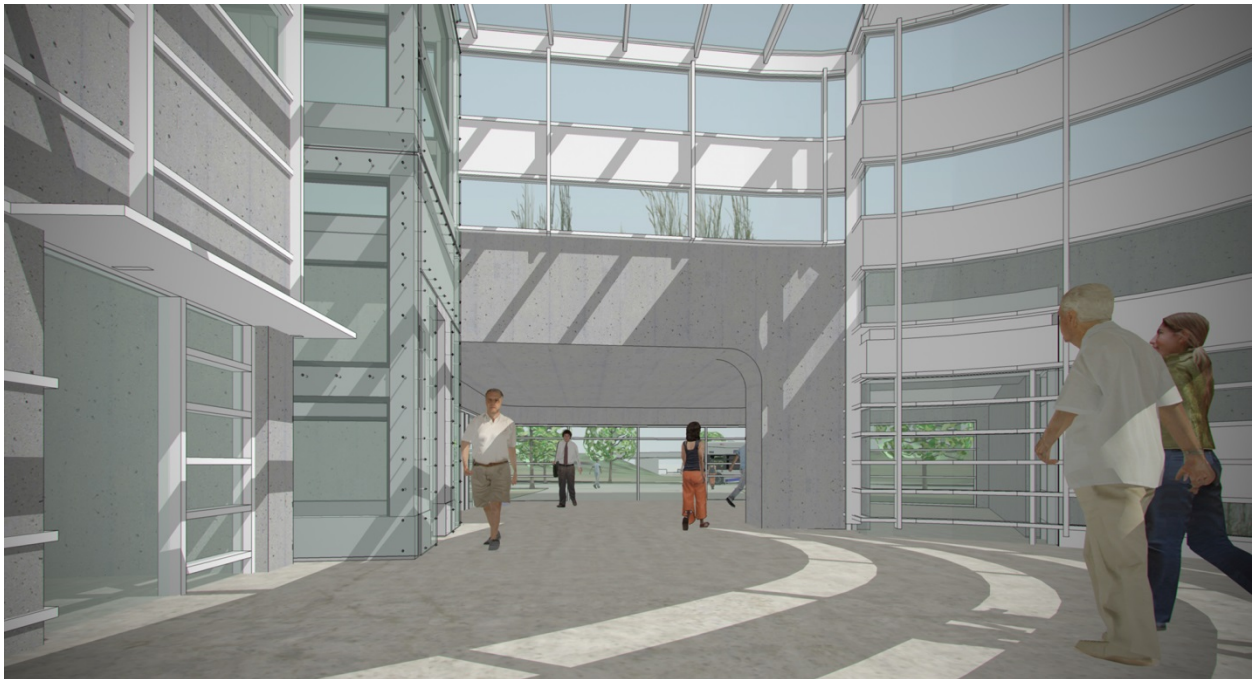
Looking west, showing crossing from station to bus loop



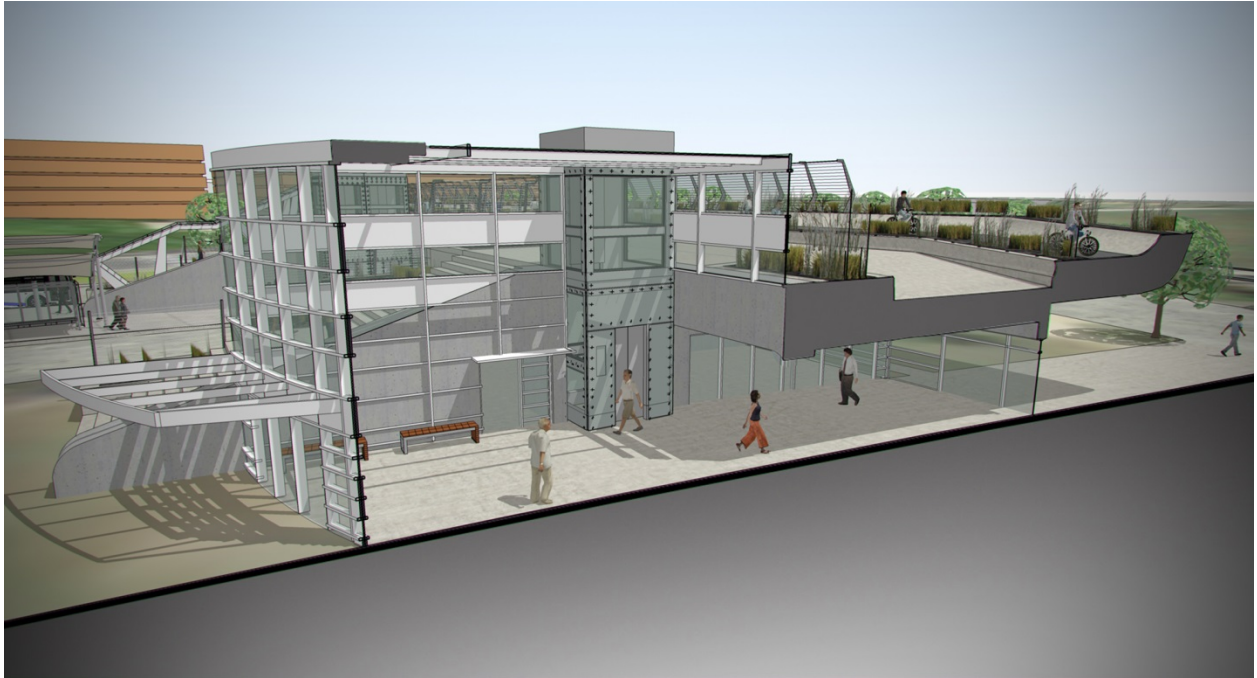
Looking east, showing atrium from Howard Road



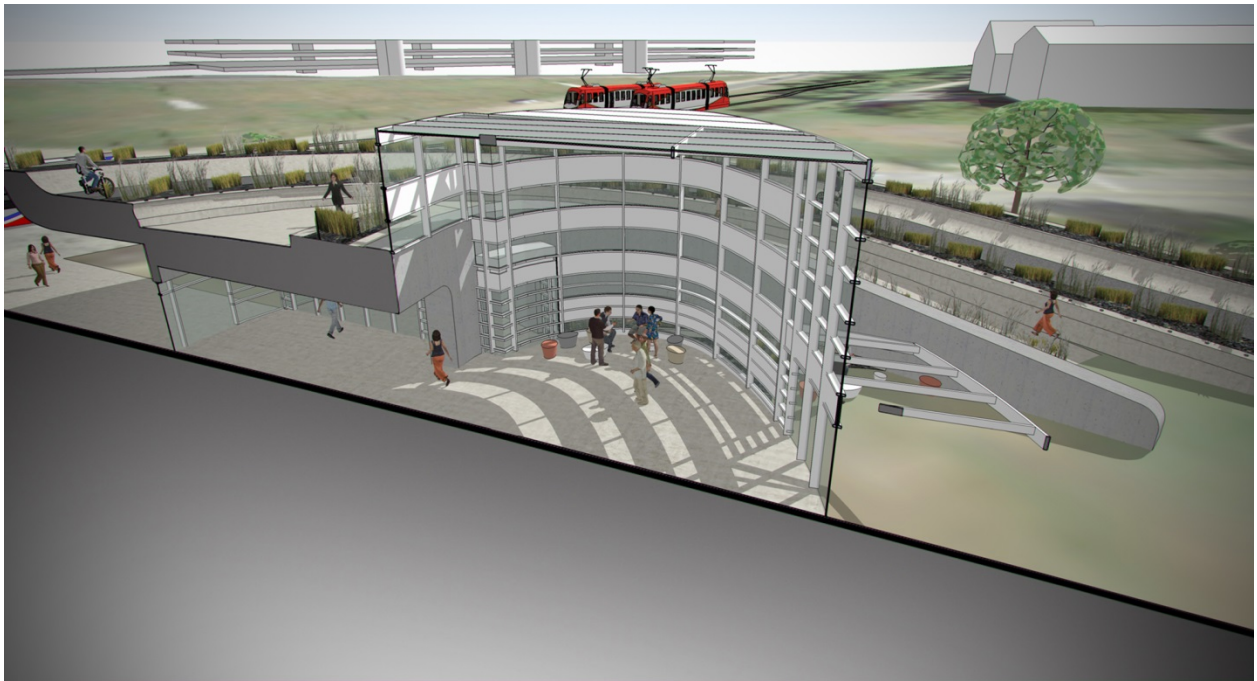
Looking east, showing atrium from Howard Road



Atrium passageway, between Howard Road and station



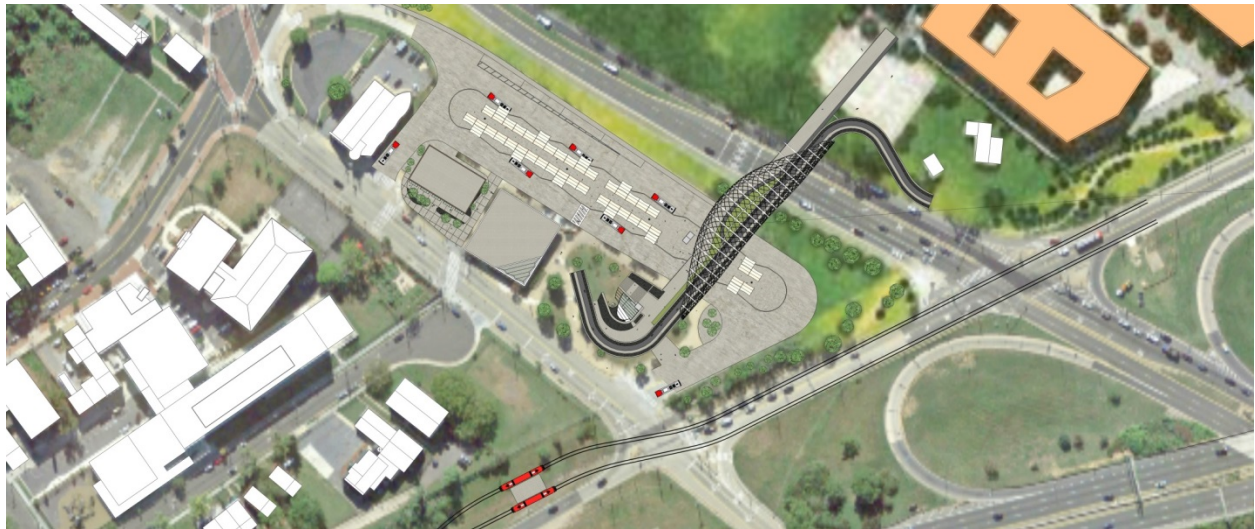
Atrium passageway, looking south



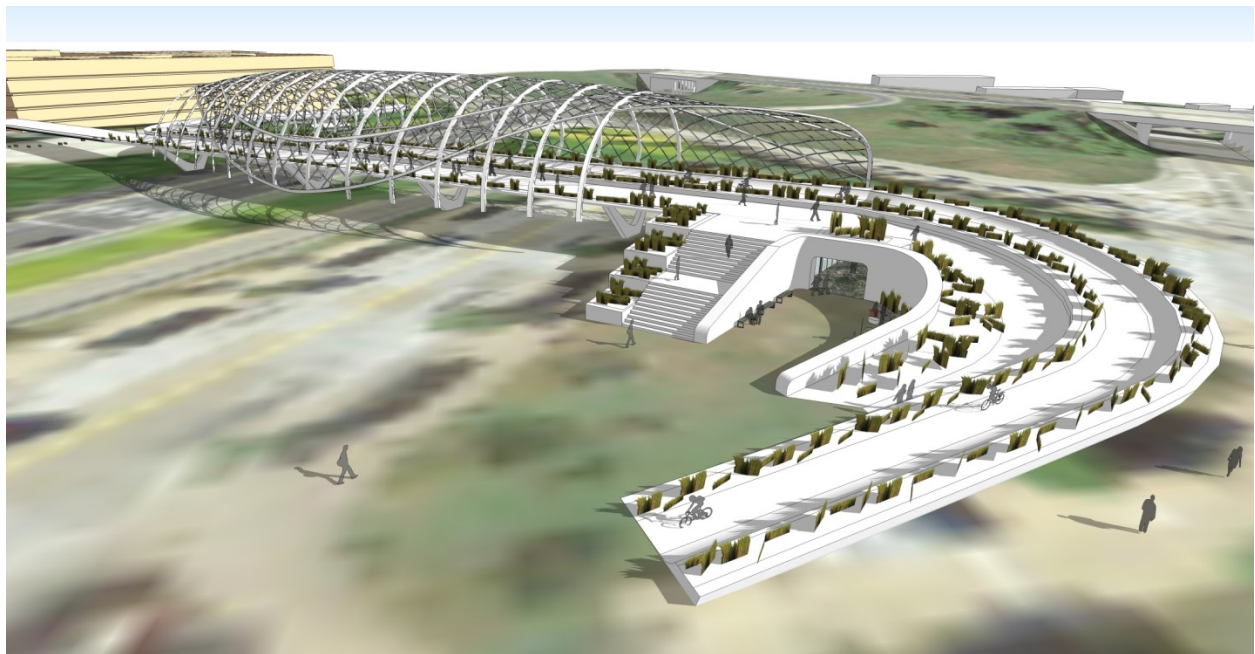
Atrium passageway, looking north

Bridge Concept Option B

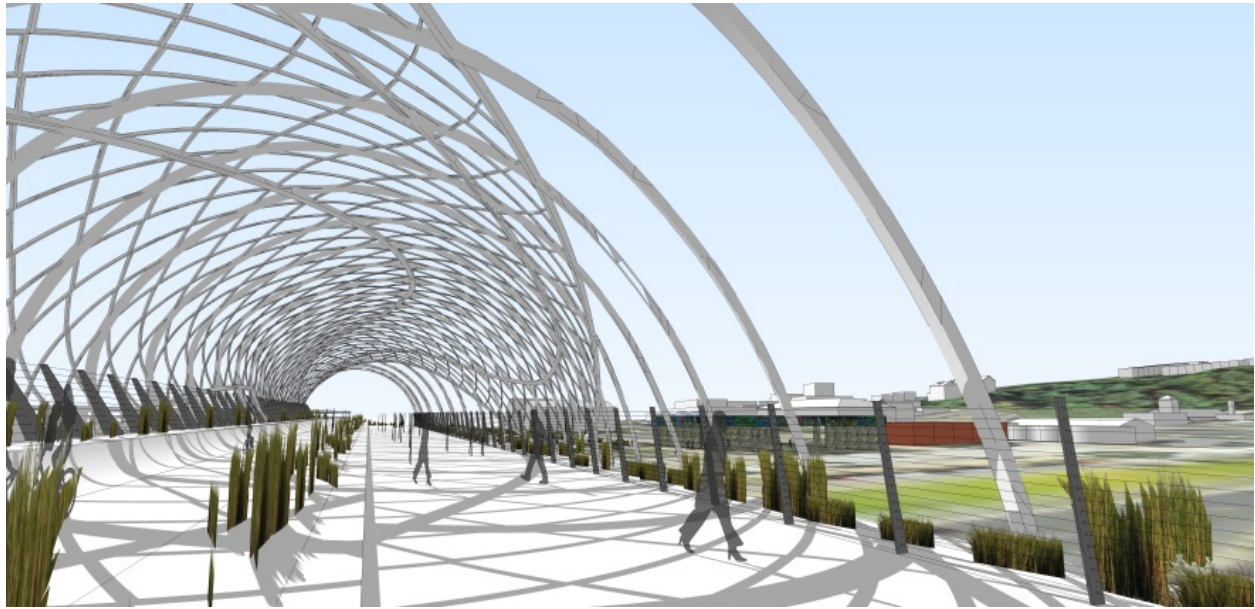
Concepts for illustrative purposes



Plan view, showing bridge connection between Barry Farm and Anacostia Metrorail Station



Looking west, bridge crossing Suitland Parkway



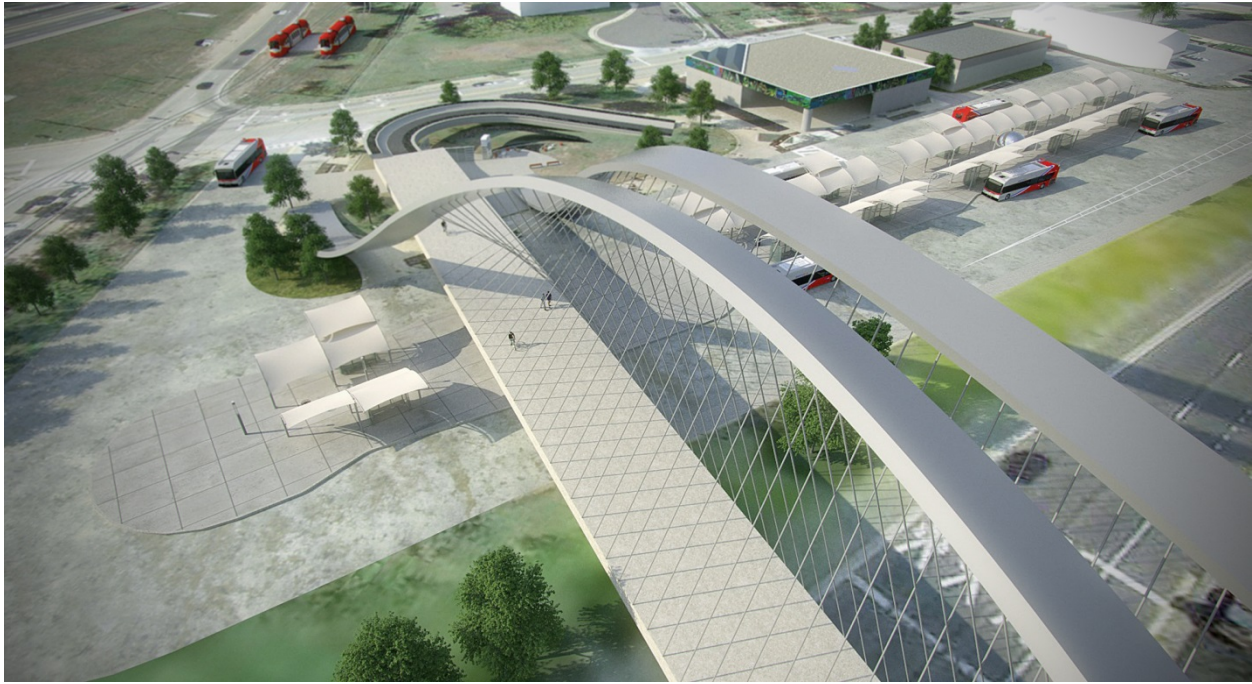
Looking north, bridge connection to station from Barry Farm



Looking west toward bridge, along Suitland Parkway

Bridge Concept Option C

Concepts for illustrative purposes



Looking north



Looking west, bridge crossing Suitland Parkway



Looking south, bridge connection to Barry Farm from station



Looking west toward bridge, along Suitland Parkway



Appendix D: Cost Estimates



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**Washington Metropolitan Area Transit Authority
Anacostia Pedestrian Bridge Estimate**

Unit	Cost (2014 Dollars)	Soft Costs	Total Costs
Retail Building	\$ 1,408,000	\$ 352,000	\$ 1,760,000
Atrium	\$ 1,618,000	\$ 404,500	\$ 2,022,500
Large Stairwell and Police Substation	\$ 2,377,000	\$ 594,250	\$ 2,971,250
Small Stairwell and Bathrooms	\$ 576,000	\$ 144,000	\$ 720,000
North Side of Howard Road	\$ 716,000	\$ 179,000	\$ 895,000
South Side Howard Road	\$ 1,000,000	\$ 250,000	\$ 1,250,000
Bridge	\$ 7,401,000	\$ 1,850,250	\$ 9,251,250
Elevators	\$ 2,317,000	\$ 926,800	\$ 3,243,800
Busway	\$ 1,027,000	\$ 256,750	\$ 1,283,750
Bus Island	\$ 735,000	\$ 183,750	\$ 918,750
Bus Island Canopy	\$ 2,189,000	\$ 547,250	\$ 2,736,250
Landscaping	\$ 1,025,000	\$ 256,250	\$ 1,281,250
Subtotal	\$ 22,389,000	\$ 5,944,800	\$ 28,333,800
All Utility Relocations	\$ 380,000	\$ 95,000	\$ 475,000

Soft Costs Assumptions

Professional Services	(General Construction)	20%	e.g. Project Development, Engineering, Project Mgt., Construction Admin. & Mgt., Professional Liability, Legal/Permits, Surveys/Testing, Start up
Professional Services	(Includes Systems Construction)	35%	
Unallocated Contingency		5%	
Annual Escalation		3%	Not applied to this estimate.

Cost Estimating Assumptions:

Estimates are prepared using current dollars (2014)
Adequate experienced craft labor is available
Normal productivity rates as historically experienced are utilized
Compatible trade agreements exist in the region
No strike impacts will be experienced by the project
There are sufficient experienced contractors available to perform said work
Normal Metro Washington D.C. area weather impacts to constructions schedule
Existing state of the art construction technology will be utilized
Assumes cooperation between stakeholders
No escalation is included
2014 Costs include base construction, sales tax, contractor mark-up, subcontractor mark-up & allocated contingency.
Estimate assumes a Design-Bid-Build project delivery
Estimate assumes maintaining operation of the bus facility during construction