



The Heights Building Phase 2 Transportation Commission – April 28, 2022

(Submitted April 28, 2022)

INCLUSION * EXCELLENCE * INNOVATION



Outline

- 1. Summary
- 2. Project Background
- 3. Proposed Design
- 4. Construction Phase
- 5. Next Steps

Appendix: Additional Information



Summary



Summary

- Since its opening in September 2019, The Heights Building has operated under an interim site plan condition.
- The final site plan condition was deferred due to the selection of the APS site to temporarily house Arlington County Fire Station 10 during construction of its permanent home.
- The Heights Phase 2 project will complete the project with improvements to building access, accessible parking, bicycle infrastructure, athletic facilities, and overall school operations. The project is included in the School Board Adopted FY 2022-24 CIP.
- The project's <u>Multimodal Transporation Assessment (MMTA)</u> concludes that that project will not have a detrimental impact on the surrounding multimodal transportation network and will significantly improve existing transportation issues.
- Construction is expected to begin Fall 2022 and extend through 2023.



Summary of Development Phases



Phase 1 – Interim

- From September 2019 school opening to current
- Temporary fire station was removed November 2021 and area converted to a natural grass field
- Includes temporary field and entrances access



Phase 2 – Final

- Completion expected late 2023
- Includes permanent synthetic turf field, covered entrance access, onsite transportation facilities, and storm water facility
- No field on site during construction



Project Background



Project Background

• June 2014

- Project included in <u>FY 2015-24 CIP</u> as part of 1,300 secondary seats
- County-led Western Rosslyn Area Planning Study (WRAPS) begins
- September 2014 School Board action on architecture/engineering contracts for secondary seat studies at Heights, Hamm, and Reed sites
- December 2014 <u>School Board direction</u> to divide 1,300 secondary seats into two projects: (1) The Heights Building and (2) Hamm Middle School
- April 2015 Concept Design begins with <u>first BLPC meeting</u>
- July 2015 County Board adopts the WRAPS Area Plan
- December 2015 School Board approves Concept Design



Project Background (continued)

• July 2016

- School Board <u>motion</u> approves <u>Schematic Design</u> that includes a garage
- County and School Boards approve a <u>license agreement</u> permitting a temporary fire station on APS property and delaying construction of a field/garage
- September 2016 County Board approves <u>Rosslyn Highlands Park +</u> Coordinated Open Spaces Plan

• February 2017

- County Board approves WRAPS developments, including Heights Use Permit and Penzance and Queens Court site plans. County Board deferred consideration of the proposed 93 space parking garage until removal of the temporary fire station.
- School Board approves demolition contract and construction begins
- January 2018 School Board approves <u>Final Design</u> and Construction Contract
- September 2019 Heights Building opens



Project Background (continued)

- August 2020 School Board Work Session, The Heights Building
 Accessibility and Capital Project Planning presentation (includes details associated
 with the interim condition, including its challenges, and several options for Phase 2)
- May 2021 School Board Work Session #1, Superintendent's Proposed FY 2022-24 CIP <u>presentation</u> (includes the Phase 2 options considered)
- June 2021
 - Heights Phase 2 "Option A" discussed at the <u>Joint CIP Work Session with the County Board</u>
 - Heights Phase 2 "Option A" approved in the <u>School Board Adopted FY 2022-24</u> <u>Capital Improvement Plan</u>
- November 2021 Temporary fire station removed from APS site
- December 2021 completed data collection for the Multimodal Transportation Assessment (MMTA)
- January 2022 Rosslyn Highlands Park completed
- February 2022 APS submits application for a Use Permit Amendment



Proposed Design



Features of the Proposed Design

- Principle features of the project include:
 - An inviting and universally accessible path to a main entrance adjacent to the Shriver Program administrative area;
 - Covered, off-street area for student pick-up and drop-off for those with differing abilities;
 - Convenient handicap parking for staff and visitors, immediately adjacent to a building entrance; and
 - The largest possible lighted synthetic turf field for school and community use.
- Other features include:
 - Required stormwater management infrastructure;
 - Enhanced, covered bicycle facilities for students and visitors that exceed the minimum required;
 - Secure bicycle facilities for staff that exceed the minimum required;
 - Outdoor equipment storage; and
 - The only on-site parking spaces within the exclusive control and operation of APS.



Comparing the 2017 and 2022 Proposals

• In general, the 2022 proposal is developed to a higher level of detail than what was available in 2017.

	2017 Proposal	2022 Proposal	2022 Alternative
Field Elevation	175' elevation , at-grade alignment with Rosslyn Highlands Park at middle of field, not aligned with Heights Building	180' elevation , at-grade alignment with Heights Building Level 1 and Rosslyn Highlands Park at corner of field	
18th Street Along APS Frontage	 14' sidewalk (10' clear sidewalk and 4' tree zone) Parking lane 	 22'-8" sidewalk (10' clear sidewalk, 5' tree zone, and 7'-8" boarding/alighting) No parking lane 	 15'-3" clear sidewalk Streetscape designed to support bus operations, likely no street trees Parking lane
Parking	93 spacesSpecific uses not defined	 61 spaces, preliminary designations: 7 ADA Accessible 2 ADA Accessible (Van) 14 Visitor 30 Long-term staff 2 Staff loading/unloading 6 Maintenance and parcel 	
Field Egress	Identified 2 total , not fully resolved	4 total (2 accessible) to align with what is required by the building code	



Transportation Demand Management

- APS intended to use the 2020 APSGo! survey results to monitor transportation demand management (TDM) and inform the project.
- Unfortunately, the survey was launched in March 2020 shortly before the pandemic began. Preliminary response rates were very low and the survey was ultimately being canceled due to the pandemic.
- On March 20, 2021, the County Board approved amendments to 33 school Use Permits, including Heights, to standardize TDM requirements and align data collection and reporting with the APSGo! Survey.
- The next division-wide APSGo! survey is not yet scheduled.
- APS completed a detailed <u>Multimodal Transportation Assessment</u>
 (<u>MMTA</u>) which concluded that the project will not have a detrimental impact on the surrounding multimodal transportation network and will significantly improve observed existing transportation challenges.

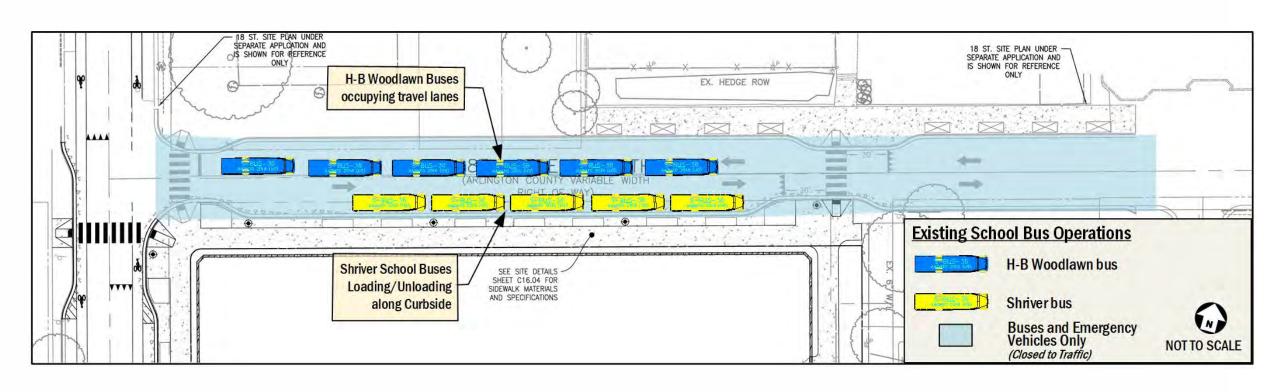


• Both schools currently use 18th Street (curb-to-curb) between Quinn Street and the mid-block crosswalk for boarding and alighting during arrival and dismissal.











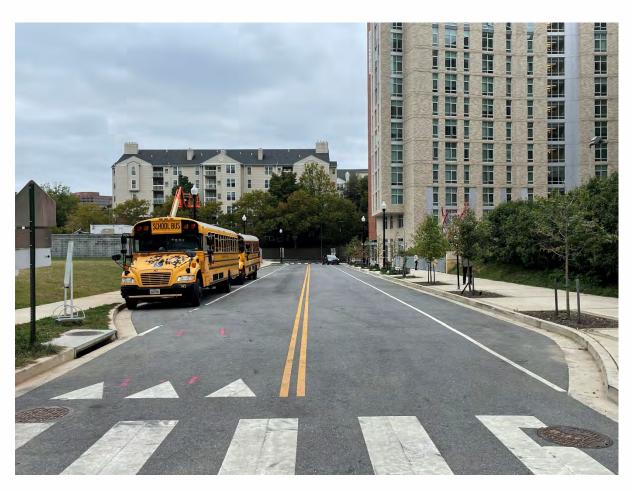
• There is not sufficient space for students waiting on the sidewalk for loading and unloading buses.







• Vehicles enter 18th Street during arrival and dismissal hours despite "Do Not Enter" signs, conflicting with buses.







Revision to 18th St N Sidewalk

2017 Proposal

- Included a 14' sidewalk (10' clear sidewalk and 4' tree zone) and a parking lane.
- Based on arrival/dismissal observations, this design would be insufficient to support all the expected activities.

2022 Proposal

- Includes a 22'-8" sidewalk (10' clear sidewalk, 5' tree zone, and 7'-8" boarding/alighting) and no parking lane.
- Sufficient space for students to queue during arrival and dismissal.
- Adequate sidewalk widths to allow typical pedestrian activity to take place concurrently with arrival and dismissal.
- Ability for Shriver school buses to load and unload wheelchairs directly on the sidewalk, without conflicting with queueing or circulation.
- Ability to meet APS and County goals for street tree planting and increase the likelihood of tree survival.
- Eliminates the possibility of illegally parked cars along the school frontage that would conflict with arrival and dismissal.
- The temporary field is currently used to support queueing and pedestrian activity, however, this will no longer be possible at the conclusion of Phase 2.

2022 Alternative

• Includes a 15'-3" sidewalk; permits parking lane to remain along APS frontage, likely results in no street trees to allow successful bus operations (boarding, alighting, queuing, circulation, etc.).



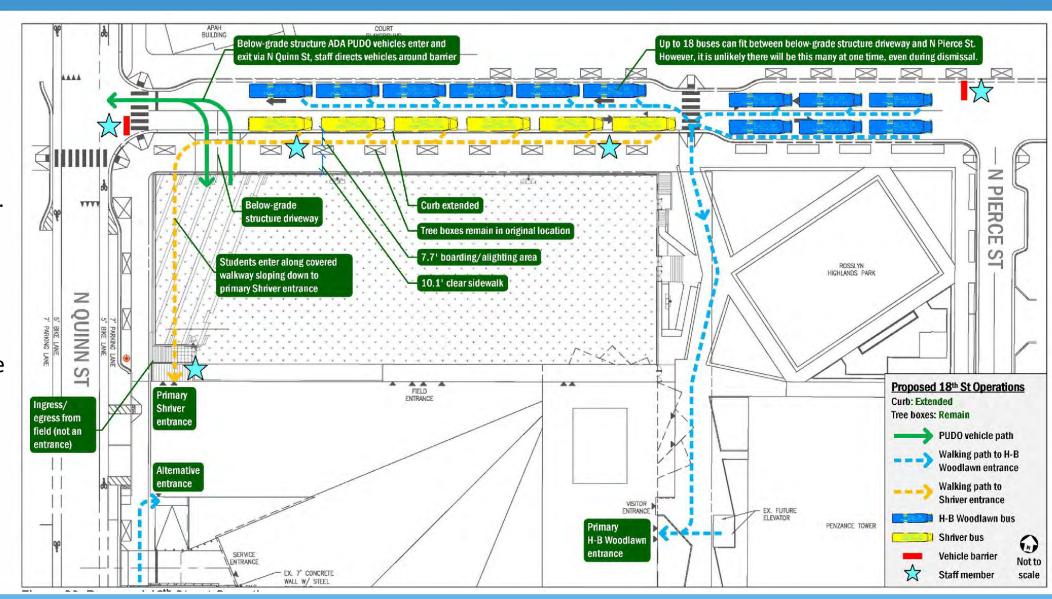
Proposed 18th Street Operations

Similar to the existing condition, 18th St N will be closed to public traffic and one-way between N Quinn and N Pierce during arrival and dismissal.

Based on observations buses occupy the street from: 8:45-9:25am and 3:40-4:30pm.

During street closure access to the below-grade structure will be limited to qualifying Pick-up Drop-off (PUDO) vehicles.

Source: MMTA





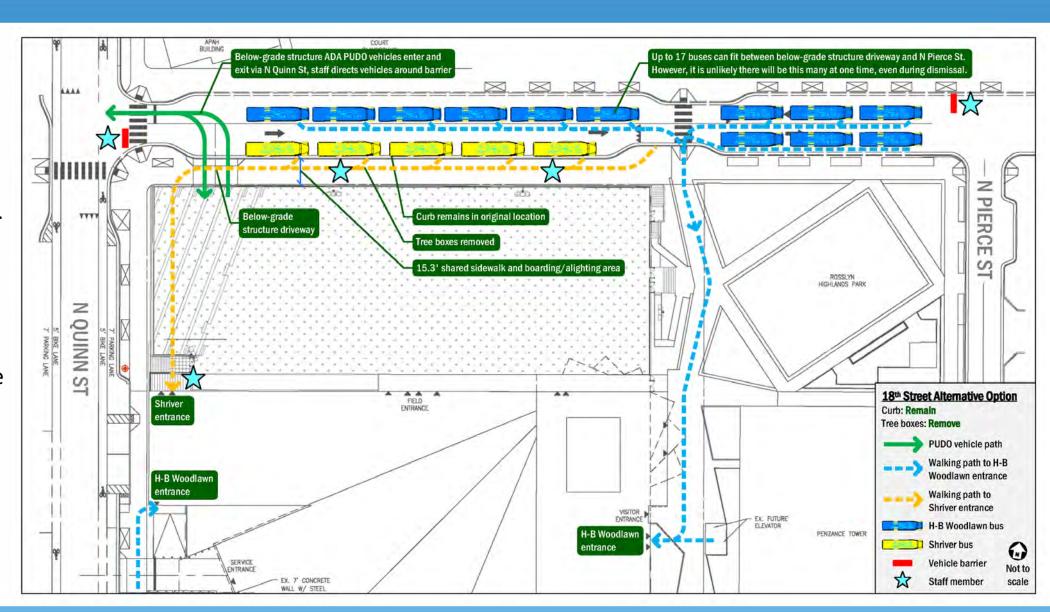
Alternative 18th Street Operations

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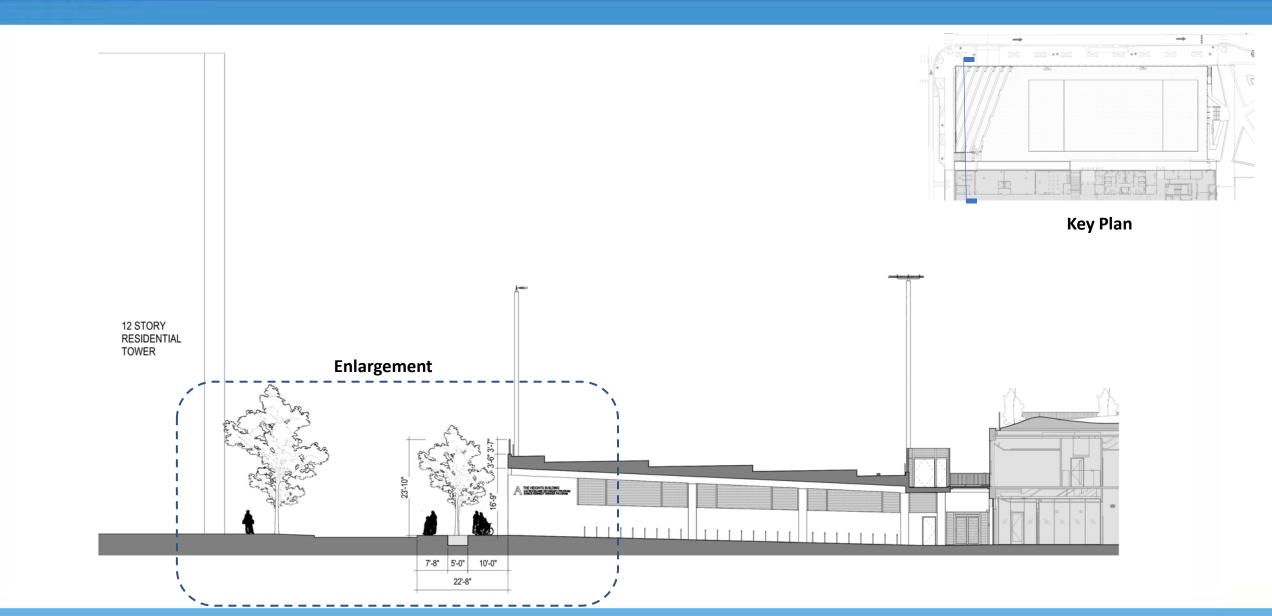
Source: MMTA





Site Section at 18th St N & N Quinn St

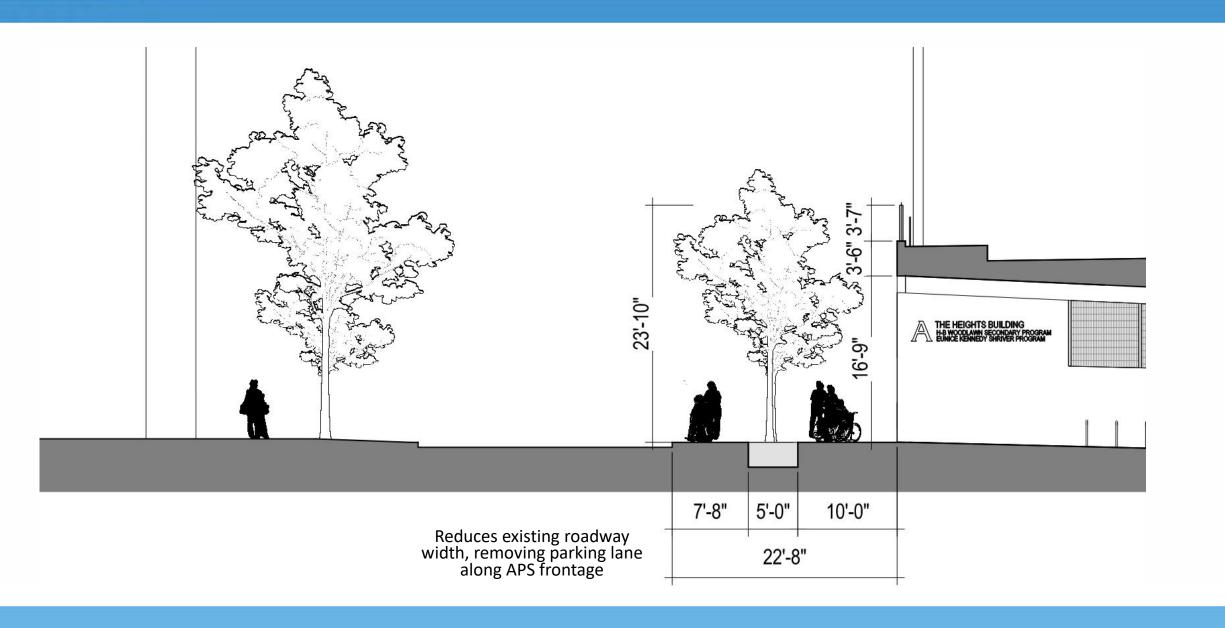
Showing Proposed 18th St N Streetscape





Enlarged Site Section at 18th St N & N Quinn St

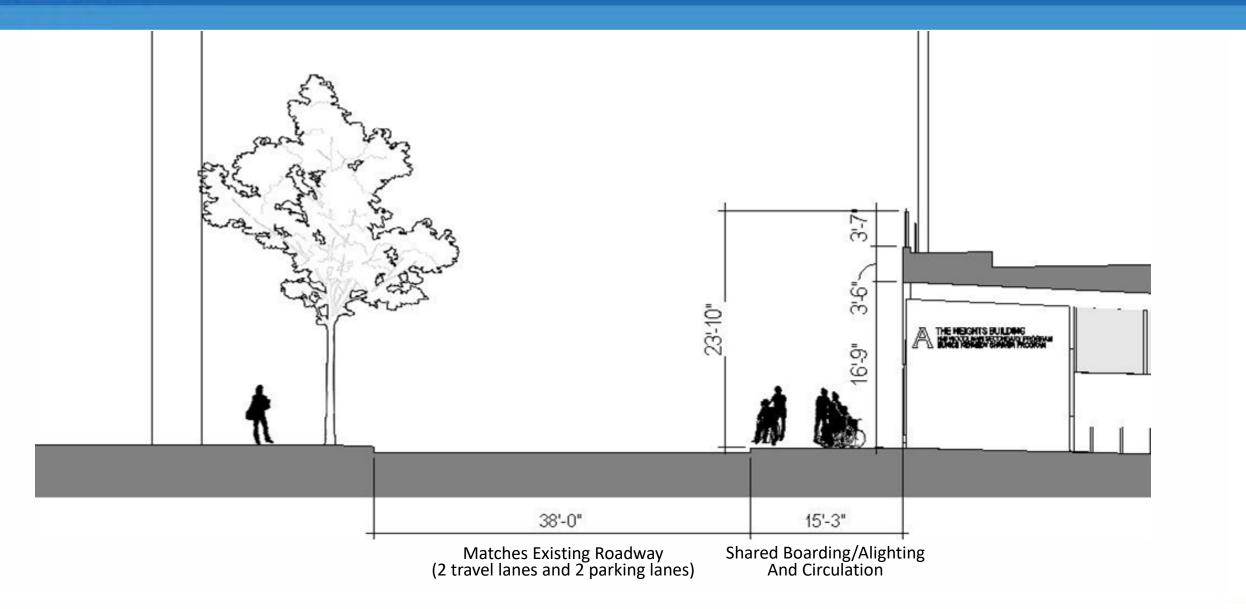
Showing Proposed 18th St N Streetscape





Enlarged Site Section at 18th St N & N Quinn St

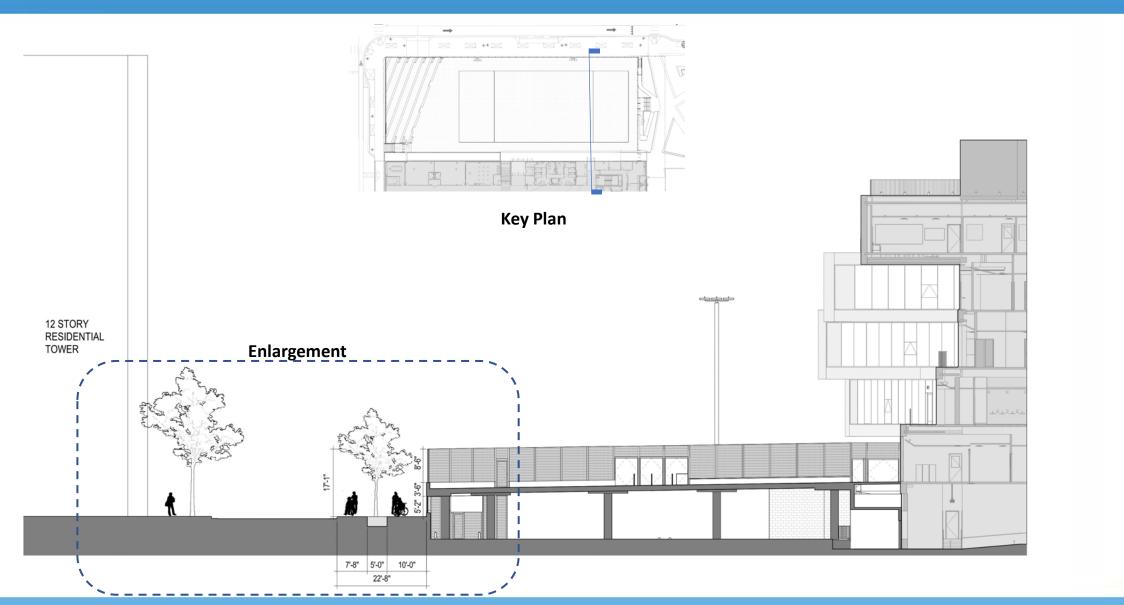
Showing Alternative 18th St N Streetscape





Site Section at 18th St. Near Park

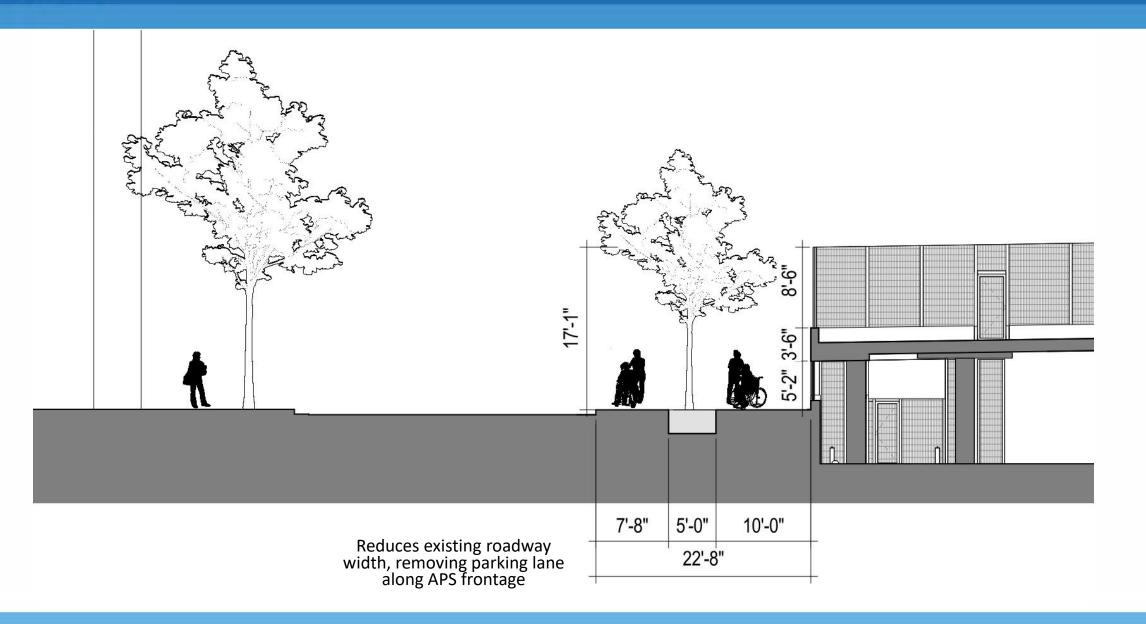
Showing Proposed 18th St N Streetscape





Enlarged Site Section at 18th St. Near Park

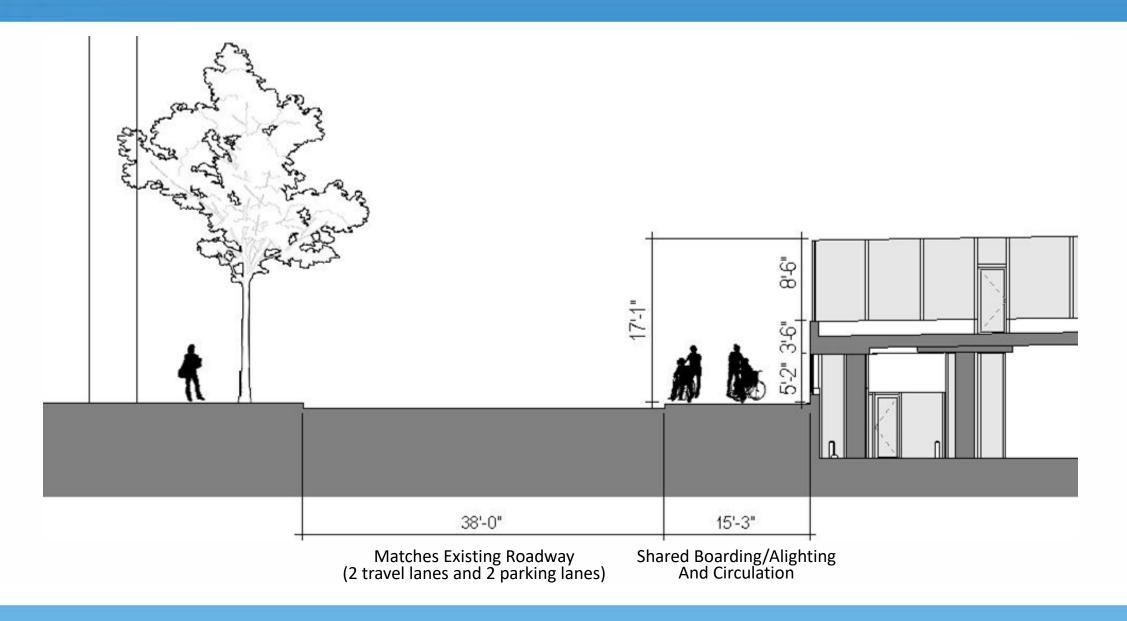
Showing Proposed 18th St N Streetscape





Enlarged Site Section at 18th St. Near Park

Showing Alternative 18th St N Streetscape





Improvements Provided with the Below-grade Structure See Appendix for Additional Detail

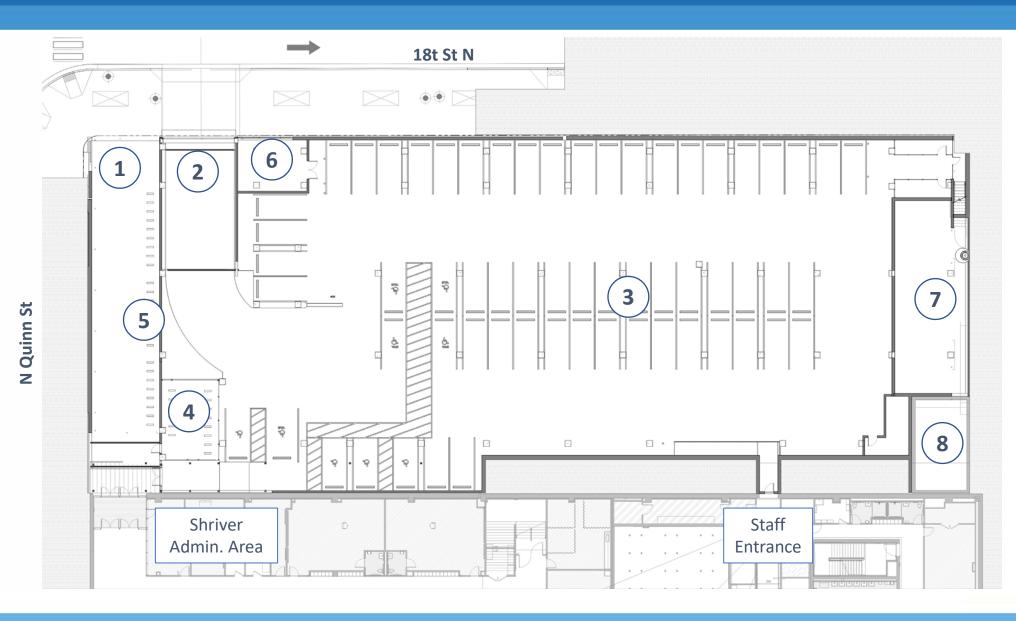
Component	Existing Condition	Proposed in Below-grade Structure
Shriver Pick-up Drop-off (PU/DO)	Functions poorly, relies on 3 signed on-street spaces which are often occupied by other vehicles. Number of spaces insufficient for demand.	9 ADA spaces provided (2 van sized) which should accommodate all demand. Provides covered area for PU/DO directly adjacent to a main entrance.
ADA parking	Relies on 4 ADA spaces (1 van sized) in Aubrey garage and 2 signed ADA spaces on Wilson/Quinn. Spaces not always available and are a considerable distance from the Shriver areas.	9 ADA spaces provided (2 van sized) which should accommodate all demand. Provides covered area directly adjacent to a main entrance.
Long-term staff parking	Accommodated through 90 spaces in Aubrey garage, plus an additional 30 leased at 1776 Wilson	30 spaces provided eliminates the need for APS to lease and manage off-site parking (except at Aubrey garage)
Staff parking loading/unloading	Short-term staff parking relies on on-street parking and often conflicts with other uses	2 spaces provided, eliminates conflicts
Visitor parking	10 spaces provided in Aubrey garage, validated by APS	14 spaces provided, the need for validation is removed. The 10 in the Aubrey garage become available for staff parking.
Maintenance and parcel parking	None designated, often conflicts with other uses	6 spaces provided, eliminates conflicts
Event parking	Relies on nearby on-street parking and garages	Spaces provided reduces the need for validation with parking needs for small/moderate events fully accommodated



Plan View: Entrance & Parking (Heights Level G1) Showing Proposed 18th St N Streetscape

Features:

- 1 Covered walkway to Heights Level G1
- 2 Vehicle entrance from 18th St N
- 3 61 spaces (9 ADA spaces)
- 4 28-Class I bicycle spaces (staff)
- 5 50-Class II bicycle spaces (visitors & students)
- **6** Equipment storage
- **7** Stormwater vault
- 8 Existing cistern





Aerial View from N Quinn St/18th St N Showing Proposed 18th St N Streetscape





Street View from N Quinn St/18th St N Showing Proposed 18th St N Streetscape





Aerial View from Rosslyn Highlands Park/18th St N Showing Proposed 18th St N Streetscape





Street View from Rosslyn Highland Park/18th St N Showing Proposed 18th St N Streetscape





View from Rosslyn Highland Park





Aerial View from N Quinn St Showing Proposed 18th St N Streetscape





Construction Phase



Construction Phase

- Separating completion of Phase 1 and Phase 2 increased construction cost and complexity.
- The Heights Building will remain in operation during construction, except for APS breaks and holidays.
- Construction is expected to begin in Fall 2022 and extend through 2023.



Next Steps



Use Permit Review Next Steps

- April 14, 2022 Public Facilities Review Committee (PFRC) Meeting
- April 19, 2022 Parks and Recreation Commission (PRC) Meeting
- April 28, 2022 Transportation Commission Meeting
- May 2/4, 2022 Planning Commission Meeting
- May 14/17, 2022 County Board Use Permit Hearing





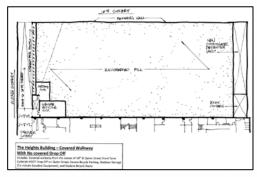
Questions

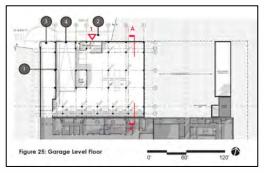


Appendix: Additional Information

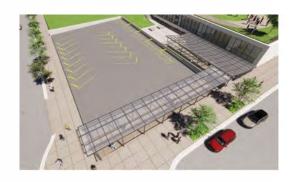


Alternatives Considered But Dismissed









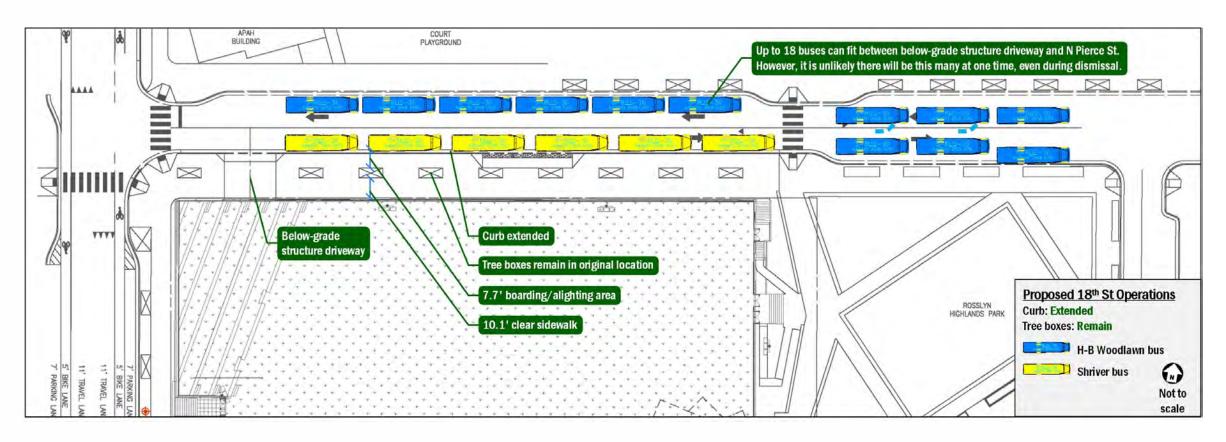
Option B	Option C	Option D1	Option D1
Turf field over covered entrance to Heights G1 level.	Turf field over partial below-grade structure about half the width of the field.	Natural grass field with covered entrance to Heights G1 level.	Combination natural grass field and surface parking with covered entrance to Heights G1 level.
 Required significant capital investment. Does not address the most pressing on-site transportation needs. 	 Provided less value being a similar capital investment with significantly less features. Approx. \$2.7M cost savings from proposed design. Egress out of the structure would likely result in compromises to the field size/function. 	 Required significant capital investment. Field areas would be disjointed and sloped. No lighted artificial turf field. Does not address the most pressing on-site transportation needs. 	 Required significant capital investment. Inadequate and sloped field area. No lighted artificial turf field.

Sources: August 18, 2020 Heights Phase 2 Work Session, May 11, 2021 CIP Work Session



Proposed Conditions – 18th Street N

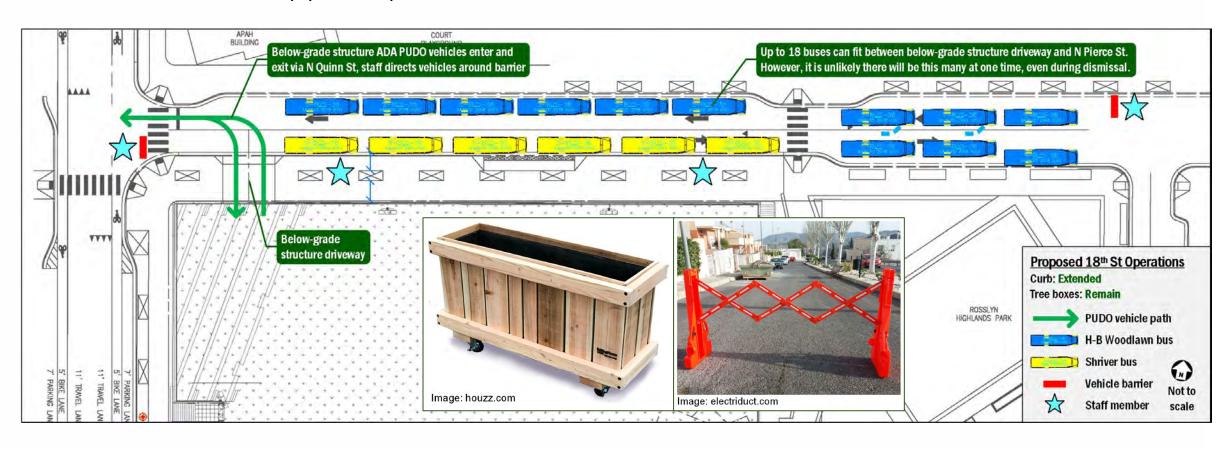
A curb extension will increase space for both walking and students waiting for loading and unloading buses.





Proposed Conditions – 18th Street N

Barriers and staff will help prevent potential conflicts between buses and vehicles.





Existing Conditions – ADA Pick-Up/Drop-Off

Spaces are limited for ADA PUDO on Quinn St.



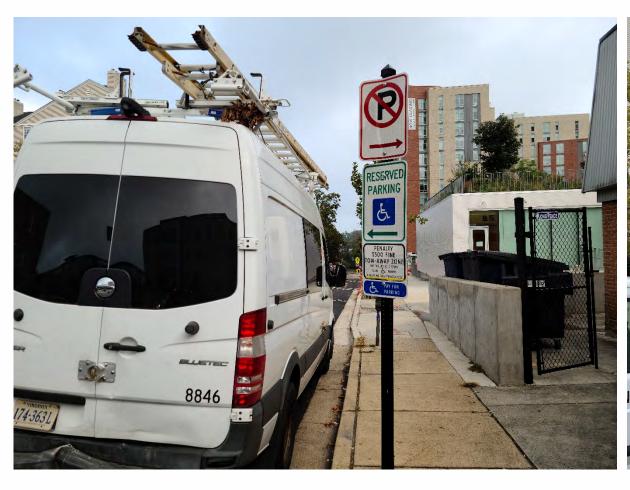
There is no covered entrance for Shriver students.





Existing Conditions – ADA Pick-Up/Drop-Off

Maintenance vehicles frequently occupy ADA loading spaces on Quinn St.



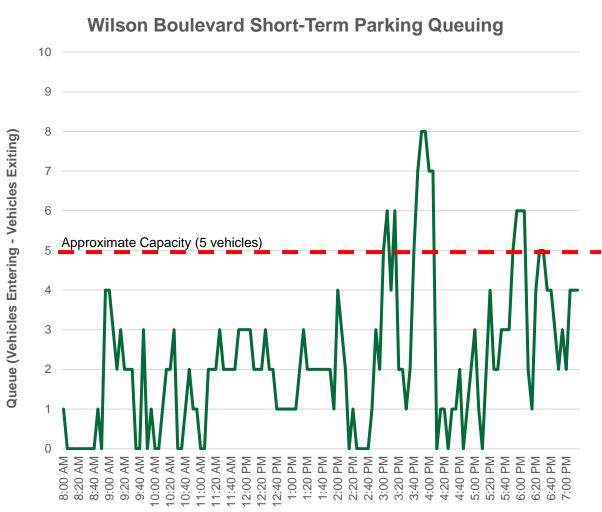




Existing Conditions – Short-Term Parking

Vehicles queue in the travel lane on Wilson Blvd.







Existing Conditions – Short-Term Parking

Maintenance vehicles and delivery vans occupy parking spaces and conflict with PUDO.

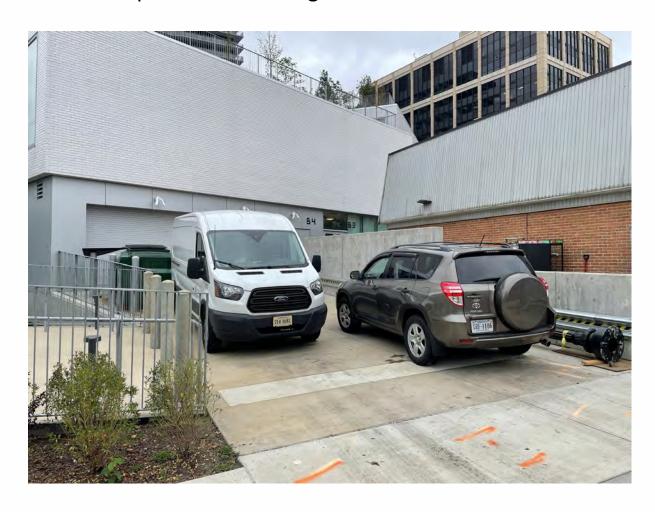


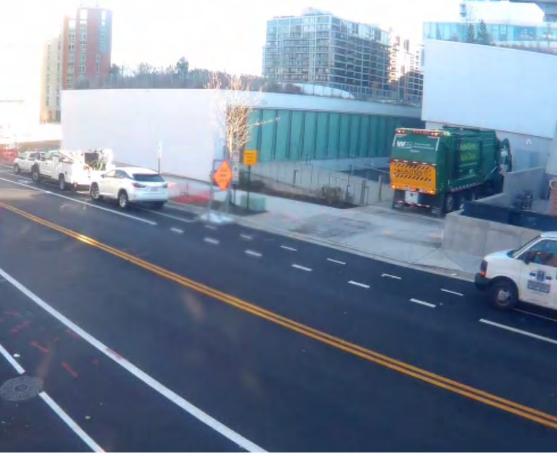




Existing Conditions – Loading Conflicts

Vehicles park in the loading area on Quinn St and conflict with large deliveries and trash removal.

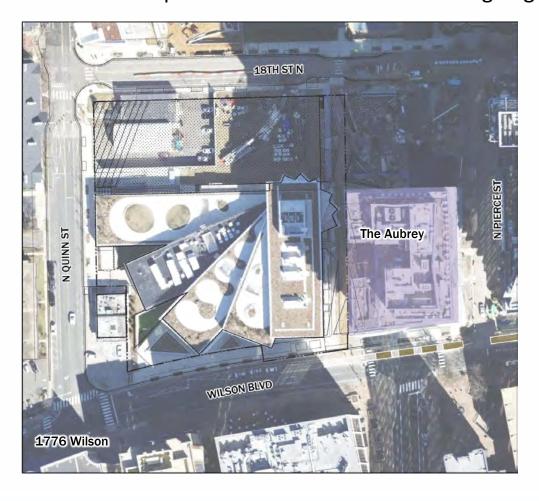


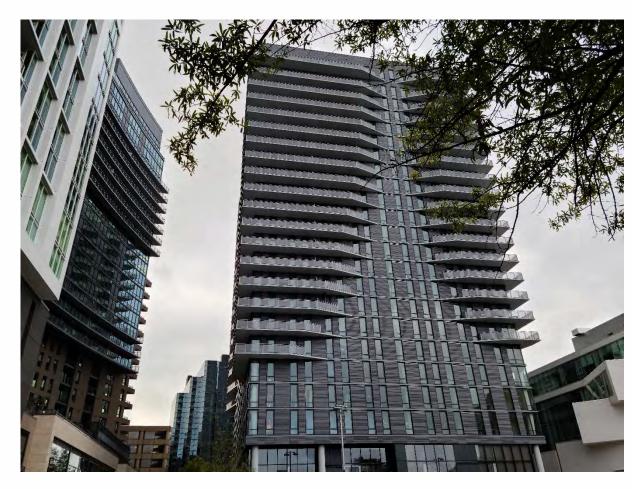




Existing Conditions – Staff Parking

• 100 parking spaces reserved for APSA, for permanent/temporary staff, and long-term visitors in The Aubrey with 30 additional spaces leased in the 1776 Wilson garage

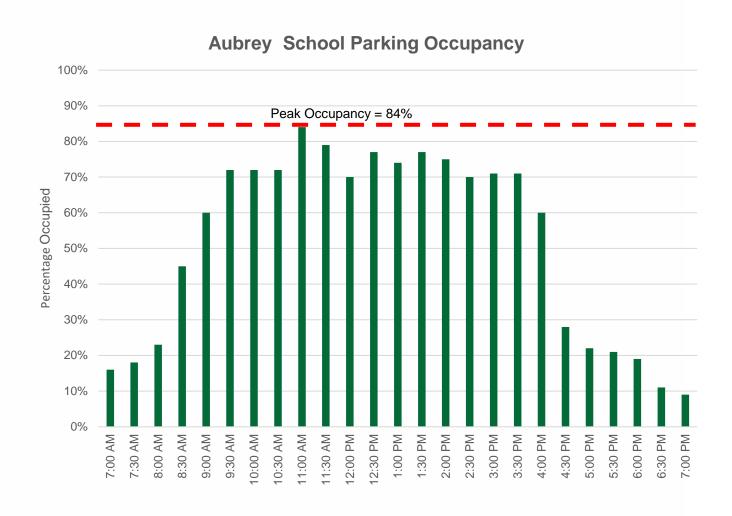






Existing Conditions – Staff Parking

- Based on December 2021 data, highest occupancy occurred during school hours (8:30 AM to 4:00 PM) with a daily peak at 11:00 AM (84 spaces).
 - Traditionally, an 85% occupancy rate is considered an ideal level of parking utilization to be considered "full" while having space to accommodate demand from incoming vehicles.
- The reserved parking spaces in Aubrey have limited capacity to accommodate additional demand.
 - Additional parking is required for events.
 - No short-term parking spaces are available for staff to load and unload supplies.
 - Occupancy is too high during school hours to consolidate 1776 Wilson Blvd spaces into the Aubrey.





Existing Conditions – Bicycle Parking

Racks are taped off along Wilson due to frequent theft.



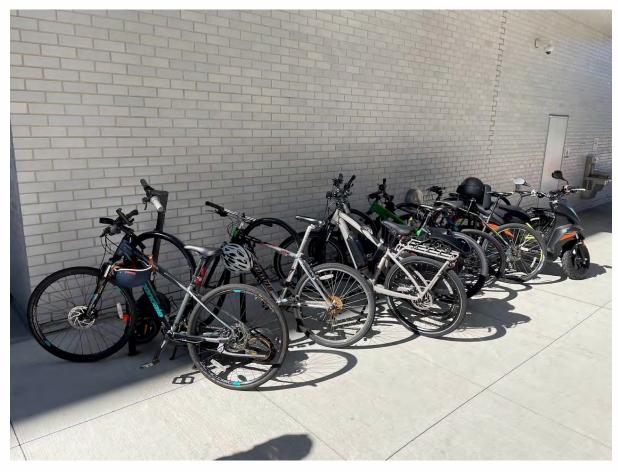
 Other racks and bike boxes by Shriver underutilized due to lack of cover and inaccessibility.





Existing Conditions – Bicycle Parking

• As a result of issues with the other racks and bike boxes, the racks by the main H-B Woodlawn entrance are overcapacity.

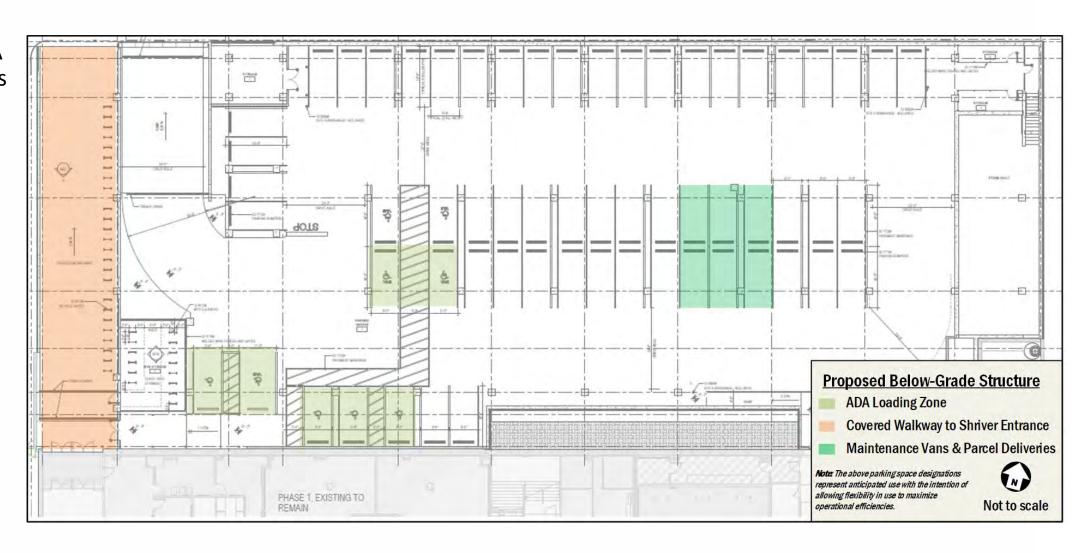






Proposed Conditions – Below-Grade Structure

- Seven (7) ADA loading spaces increase Shriver PUDO capacity.
- A covered entrance to Shriver is provided.
- Six (6)
 maintenance
 van/parcel
 delivery
 spaces
 alleviate
 curbside
 conflicts.





Proposed Conditions – Below-Grade Structure

- 30 staff spaces will allow APS to stop leasing spaces at 1776 Wilson Blvd.
- Two (2) short-term staff parking spaces will make it easier for staff to load/unload supplies.
- 14 visitor spaces reduce demand for curbside spaces.
- Covered walkway provides protected bike racks for students.
- Bicycle storage provides secure, protected bike racks for staff.





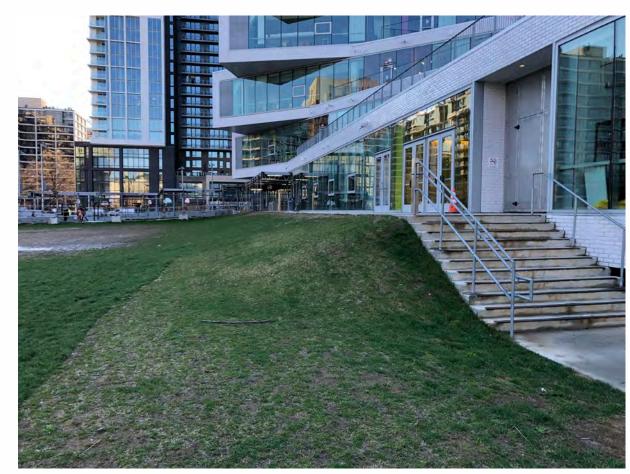
Existing Condition Photos (April 2022)

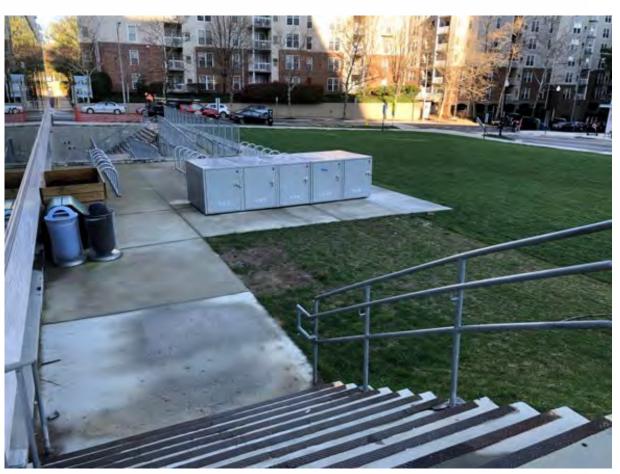


18th St N at Rosslyn Highland Park Looking West Toward N Quinn St



Existing Condition Photos (April 2022)





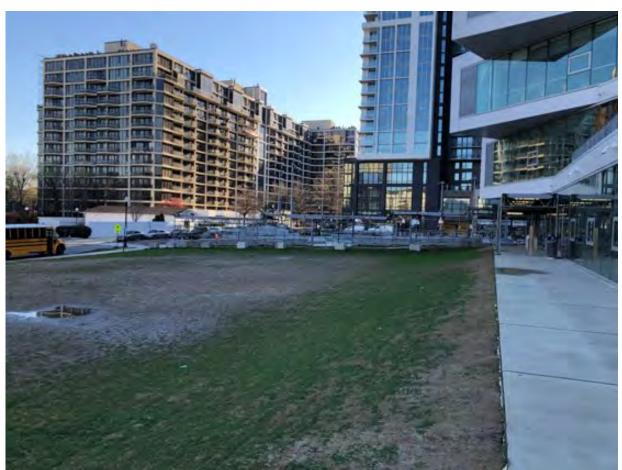
Stair Access from Heights Building Level 1 to Temporary Field (Accessible Route via Rosslyn Highlands Park or 18th St S)



Existing Condition Photos (April 2022)



Temporary Stair and Ramp to Heights Building G1 Level (Shriver Administrative Area)



View of Temporary Field Looking Toward Rosslyn Highlands Park



Revision to Field Elevation

2017 Proposal

- Identified the field elevation at 175' and required indirect access from the building to the field by ramps and stairs.
- Solution does not align with current APS goals of inclusion and universal design.

2022 Proposal

- Identifies the field elevation at 180'
 permitting direct access from the
 building Level 1 to the field, better
 supporting the intended use.
- Useable field size increased because area for ramps and stairs is not required.
- Two accessible routes from Rosslyn Highlands Park to the field are maintained, at the middle and corner of the field.



Proposed Design – Student and Public Accessible Routes



Plan View: Field (Heights Level 1)

Showing Proposed 18th St N Streetscape

Features:

- Artificial Lighted
 Turf Field
 (Striped at 195' x 82' nonstandard size, with 10'
 runoff minimum)
- 2 Door to Heights
 Building Level 1
- 3 Seating/Passive recreation
- 4 Required means
 of field egress
 (4 total required, minimum
 2 accessible)
- S Rosslyn Highlands
 Park
- Access for field maintenance
- Approx. Elevation





Aerial View from N Quinn St/18th St N

Showing Proposed 18th St N Streetscape





Material Precedent – Welded Wire Fence at Lubber Run Community Center



