MCPB Item No. 5

Date: 12-1-16

9800 Medical Center Drive, Limited Site Plan Amendment, 81995045D and Final Water Quality Plan



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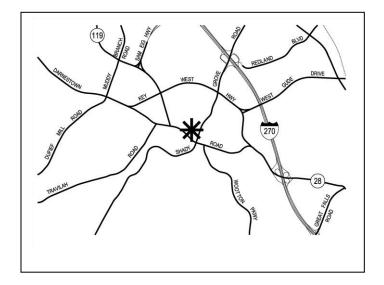


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Completed: 11/16/16

Description

- Request to amend a previously approved Site Plan for 117 additional surface parking spaces with stormwater management and landscape planting improvements;
- Location: 9800 Medical Center Drive, in the northwest quadrant of the Darnestown Road and Shady Grove Road intersection;
- 18.14 acres in the LSC Zone, in the Great Seneca Science Corridor Master Plan area, and the Piney Branch Special Protection Area (SPA);
- Applicant: ARE Maryland No. 24, LLC;
- Submitted: 6/21/16.



Summary

- Staff recommends approval of Limited Site Plan Amendment 81995045D and the Final Water Quality Plan, with conditions.
- The area inside the Amendment's scope of work is exempt from Chapter 22A, Forest Conservation, based on approval of an exemption issued on May 16, 2016 in No. 42016180E. The 1995 Site Plan approval in No. 819950450 required that the Landscape Plan provide 15 percent afforestation on-site for tree canopy coverage. The Applicant's Final Water Quality Plan addresses stormwater management with two microbioretention facilities in the parking lot expansion area.
- This Amendment was reviewed using the current Zoning Ordinance in Section 7.7.1.B.3.a., provision to review it under the former Ordinance. The Applicant considers the 117 proposed surface parking spaces an interim use until a seven-level parking garage is constructed in the general location of the expansion area in this Amendment.
- No correspondence has been received from noticed parties as of the date of this Staff Report.

SITE PLAN AMENDMENT RECOMMENDATION AND CONDITIONS

Staff recommends approval of Limited Site Plan Amendment No. 81995045D and the Final Water Quality Plan for up to 117 additional parking spaces, the previously approved total of 544,579 square feet of R&D and office space, associated stormwater management improvements and Landscape Plan changes. All site development elements shown on the latest version of Site Plan drawings submitted via ePLans to the M-NCPPC as of the date of this Staff Report are required, except as modified by the following conditions:

1. Preliminary Plan Conformance

The development must comply with the conditions of the approval for Preliminary Plan No. 119882330 as listed in the Montgomery County Planning Board (MCPB) Opinion dated September 8, 1995.

2. Site Plan Conformance

The development must comply with the conditions of approval for Site Plans 819950450, 81995045A, 81995045B and 81995045C.

3. Water Quality

The development must comply with the conditions of the Montgomery County Department of Permitting Services (MCDPS) Final Water Quality Plan approval letter dated October 17, 2016.

4. Landscape Plan

Prior to the end of the first planting season following the completion of the parking lot expansion, the Applicant must provide shade trees to address the 15 percent afforestation requirement in compliance with the 1995 Landscape Plan.

5. Lighting Plan

Prior to Certified Site Plan approval, the Applicant must provide certification to the M-NCPPC Staff from a qualified professional that the lighting plan conforms to the Illuminating Engineering Society of North America (IESNA) exterior standards for the proposed light levels in the expanded parking lot.

6. Site Plan Surety and Maintenance Agreement

Prior to the issuance of a Sediment Control Permit, the Applicant must enter into a Site Plan Surety and Maintenance Agreement with the Planning Board in a form approved by the M-NCPPC Office of General Counsel that outlines the responsibilities of the Applicant. The Agreement must include a performance bond(s) or other form of surety in accordance with Section 59-D-3.5(d) of the Montgomery County Zoning Ordinance, with the following provisions:

- a) A cost estimate of the materials and facilities, which, upon Staff approval, will establish the surety amount.
- b) The cost estimate must include applicable site elements, including, but not limited to plant materials, on-site lighting, sidewalks, and associated improvements with the phase of development.
- c) The bond or surety must be tied to the development program, and completion of all improvements covered by the surety for this phase of development will be followed by inspection and potential reduction of the surety.
- d) The bond or surety for this phase shall be clearly described within the Site Plan Surety & Maintenance Agreement including all relevant conditions and specific CSP sheets depicting the limits of this phase.

7. Development Program

The Applicant must construct the development in accordance with a development program that will be reviewed and approved by the Staff prior to the approval of the Certified Site Plan.

8. Certified Site Plan

The Certified Site Plan must include the following revisions/information subject to Staff review and approval:

- a) Stormwater Management Concept/Water Quality Plan approval letter, development program, and Site Plan Resolution (and other applicable Resolutions).
- b) Add a note stating that "Minor modifications to the limits of disturbance shown on the site plan within the public right-of-way for utility connections may be done during the review of the right-of-way permit drawings by the Department of Permitting Services."
- c) Modify the data table to reflect development standards approved by the Planning Board.
- d) Ensure consistency of all details and layout of the approved limits of disturbance on the Site Plan and Landscape Plan and the Water Quality Plan.

SECTION 1: SITE DESCRIPTION, BACKGROUND AND PROPOSAL

Site Vicinity and Context

The 18.14-acre Property (outlined in red) is LSC Zoned and located in the "Central District," one of the five Districts of the Life Sciences Center (LSC) as identified in the *Great Seneca Science Corridor (GSSC) Master Plan*. Other sites in vicinity of the Property include: Shady Grove Adventist Hospital to the north; the City of Rockville limits to the east and developed as the Fallsgrove community (a mixed-use development with primarily retail and residential uses); and the Universities at Shady Grove campus and the former Human Genome Sciences Properties (located to the south and southwest, respectively). A new County Fire Station (#32) was constructed in 2012 on a parcel directly to the south of the Property at the intersection of Darnestown Road and Shady Grove Road. To the west are Research & Development (R&D) offices in the Shady Grove Life Sciences Center.



Figure 1 Vicinity Map

Site Description

The Property is triangular-shaped and bound on three sides with public roads (Medical Center Drive to the north, Medical Center Way to the northeast, and Shady Grove Road to the east). It has four existing vehicular access points, all on the south side of Medical Center Drive. The Property is currently developed with four R&D and office buildings (Buildings A-D) totaling 281,379 square feet. There are 464

existing off-street surface parking spaces in three lots that flank three of the four buildings. The Property's Medical Center Drive frontage has existing on-street, metered parking. Building A is the main entrance to the complex with a two-way, semi-circular vehicular driveway as a drop-off/pick-up area in the front along Medical Center Drive. The four buildings vary in heights from three to four-stories, and all have earth-tone brick facades. A loading dock area is located at the south side of the Property between Buildings C and D. There are two existing bike racks but no bike lockers. There is an interconnected network of sidewalks around the four buildings. One landscape island on the west side (south of Building D), does not currently have handicap ramps. Most of the Property is inside the Piney Branch Special Protection Area (SPA).

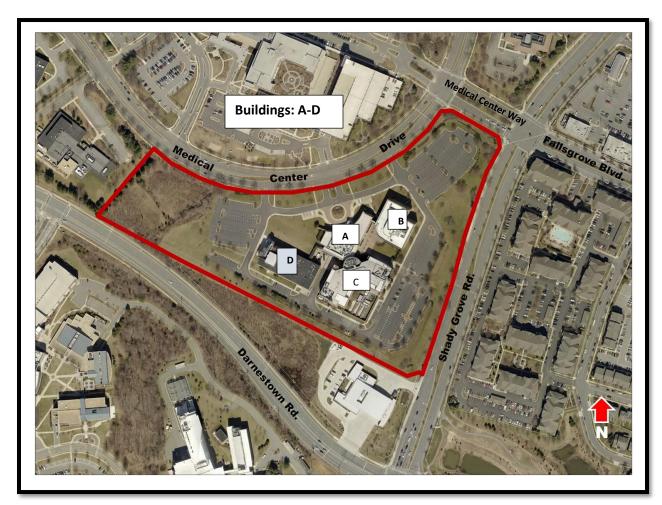


Figure 2 Aerial Photo of the Property

Previous Approvals

The Property was identified as Parcels W and O/R in the original Shady Grove Life Sciences Center Preliminary Plan No. 119882330, approved in a Planning Board Opinion mailed on March 22, 1990. The Plan created 24 lots on 180.71 acres, all in the R-200 Zone. The Application was not subject to Chapter 22A Forest Conservation because it predated the effective date of the Law.

The Planning Board approved 313,650 square feet of R&D and office uses (188,000 square feet of R&D and 125,650 square feet of office space) for Site Plan No. 819950450 in a revised Opinion re-mailed on September 8, 1995. The original Site Plan approval included a parking waiver for 100 spaces that

lowered the required maximum number of off-street, surface parking spaces from 748 to 648 spaces¹. The maximum building height was established at 110 feet. In addition, the Landscape Plan had to provide 15 percent on-site afforestation (in the form of tree canopy coverage). There were three subsequent site plan amendments as follows:

- a) 81995045A, approved on March 20, 2002, for a change in building configuration and R&D use;
- b) 81995045B, approved on March 16, 2010, for minor modifications to architecture, landscape plan and select site features; and,
- c) 81995045C, approved on September 8, 2011, for the addition of 2,479² square feet of maintenance and workshop area, limited rooftop mechanical equipment, penthouse areas, screen walls and a utility yard.

On May 4, 2010, by the GSSC Master Plan's Sectional Map Amendment (SMA), the County Council rezoned the Property from R-200 to LSC. In 2011, the Applicant filed Preliminary Plan No. 120110080 for an addition of 230,929 square feet and a new total of 544,579 square feet of R&D uses, and 1,415 structured and surface parking spaces. The Planning Board approved Preliminary Plan No. 120110080 on January 23, 2012, for two additional buildings (Buildings E and F) for R&D and office uses, and a seven-level parking garage for 938 spaces (Attachment 3)³.

In the most recent Shady Grove Life Sciences Center (SGLSC) Development Summary dated March 22, 2016, the Property has an approved density of 544,579 square feet, of which approximately 281,379 square feet of R&D and office uses have been built, with approximately 263,200 square feet unbuilt.

Proposal

The Applicant is proposing to expand one of the existing parking lots by 117 additional (interim⁴) off-street, surface parking spaces along the Property's southeast and south property lines (see the Rendering below), in order to meet the increased on-site parking needs of the R&D and light office tenants. The proposed parking spaces will increase the total number of off-street, surface parking spaces to 581 spaces, which is within the maximum required 648 parking spaces established by the parking waiver approved for Site Plan No. 819950450 in 1995. One existing concrete sidewalk segment inside the scope of work will be retrofitted with ADA-compliant handicap ramps.

This Amendment proposes to remove 28 existing shade trees currently located at the south property line. All 28 trees will be replaced at a one-for-one ratio along with ten new trees planted within the proposed limits of disturbance for a total of 38 shade and ornamental trees. This tree replanting effort is

¹ The parking waiver approval established the new maximum number of surface parking spaces at 648 based on the parking requirements for office uses in the R-200 Zone in 1995.

² The 2,479 square feet of maintenance and workshop area approved in the Site Plan's 'C' amendment is not calculated as density/approved square footage of leasable R&D and office space. Therefore, this square footage is not shown in the total of 544,579 square feet for the Property.

³ Approval of No. 120110080 included a Preliminary Forest Conservation Plan (PFCP) and a Preliminary Water Quality Plan (PWQP). The PWQP was for the future building footprint(s) of the parking garage (and Buildings E and F). The future parking garage will be located in the general area of the proposed parking lot expansion's 'scope of work' in Site Plan Amendment No. 81995045D. At such time the parking garage undergoes development review in a Site Plan, the application will include a Final Water Quality Plan for review an analysis of water quality and imperviousness by the Montgomery County Department of Permitting Services (MCDPS).

⁴ The Applicant considers the 117 additional surface parking spaces as an interim use until such time the seven-level parking garage is constructed (as illustrated in the approval of Preliminary Plan No. 120110080).

to address the 15 percent afforestation requirement of tree canopy coverage for the Property. The Landscape Plan includes a mix of new evergreen and deciduous shrubs as a visual buffer along the new parking lot edge. Additional outdoor lighting is proposed in the parking lot expansion area similar to existing lighting in the existing parking lots. A Final Water Quality Plan (WQP) addresses surface drainage inside the Piney Branch SPA required as part of the Stormwater Management Concept Plan approval; the WQP consists of a Sediment and Erosion Control Plan and a Stormwater Management Concept Plan.



Figure 3 - Site Plan Rendering (the proposed parking spaces are generally along the southern edge of the Property)

Community Outreach

The Applicant has complied with all submittal and noticing requirements. Staff electronically notified the Great Seneca Science Corridor Implementation Advisory Committee about the proposal and that the plans were available on the Planning Department's website in Development Activity Information Center (DAIC).

SECTION 2: SITE PLAN REVIEW AND ANALYSIS

Master Plan Conformance

The Property is located within the LSC Central District of the *Great Seneca Science Corridor Master Plan* area. The LSC includes five districts. Specific language on the LSC Central District from the Master Plan is included in Attachment 4, and as referenced in the pages below.

Resource Protection and Preservation

The Master Plan has recommendations regarding ways to restore environmental functions in the Plan area as it redevelops, including water quality protection (page 26). One of the ways the Plan recommends resource protection and preservation is to use required forest and tree planting to enhance and expand existing resources, where possible. Resource protection methods were required and implemented in the 1995 Site Plan approval. The parking lot expansion in this Amendment is in conformance with the Master Plan because the required amount of tree canopy coverage in this Amendment's Landscape Plan will be exceeded.

Water Quality and the Piney Branch SPA

Pages 26 through 28 of the Plan discuss both topics with emphasis on the use of Environmental Site Design (ESD) in stormwater management treatment approaches. To protect water quality, the Plan recommends site design and construction options that minimize imperviousness including parking reductions and the use of structured parking. The Final Water Quality Plan in this Amendment addresses recommendations from the Master Plan because it will continue to provide tree canopy coverage. Section 3 of this Staff Report details the Final Water Quality Plan review and the stormwater management methods to minimize imperviousness in the Piney Branch SPA in conformance with the Master Plan.

Adequate Public Facilities - Transportation

Pedestrian and Bicycle Facilities

The existing sidewalks are as follows:

- A 10-foot-wide sidewalk with no green panel along the Shady Grove Road frontage;
- A four-foot-wide sidewalk with a 10-foot-wide green panel along the Medical Center Way frontage: and
- A four-foot-wide sidewalk with a 10-foot-wide green panel along the Medical Center Drive frontage.

At the intersection of Medical Center Drive and Medical Center Way-Shady Grove Hospital driveway, handicap ramps are located at all corners. A pedestrian-marked crosswalk is located only across the Shady Grove Hospital driveway.

Master-planned shared-use paths exist on the opposite side of Medical Center Drive and Shady Grove Road. Two bike racks are currently provided on the Property (on the northeast and east areas and outside of the scope of work of this Amendment). These racks are substandard and their locations are not safe and convenient for bicyclists. When the Applicant submits the site plan for Buildings E and F and the parking garage, these bicycle facilities will be upgraded to current standards.

Transportation Adequate Public Facilities (APF) Test

The approved Preliminary Plan No. 120110080 has an APF Validity period that expires on February 23, 2023. This approval includes the seven-year validity period and extensions by the County Council.

Compliance with Zoning Ordinance

With the proposed improvements, access will be adequate to support the parking lot expansion. The proposal meets the off-street parking requirements of the LSC Zone as specified in the former Zoning Ordinance in effect on October 29, 2014. Finally, the Application was reviewed by one other County agency (DPS), which has recommended approval of the Final Water Quality Plan (Attachment 6).

SECTION 3: SITE PLAN REQUIRED FINDINGS

Site Plan Findings

Section 59-D-3.4.(c) contains the required findings by the Planning Board. In reaching its decision the Planning Board must find that:

 The site plan conforms to all non-illustrative elements of a development plan, or diagrammatic plan, and all binding elements of a schematic development plan, certified by the Hearing Examiner under Section 59-D-1.64, or is consistent with an approved project plan for the optional method of development, if required, unless the Planning Board expressly modifies any element of the project plan.

Not applicable; the Property is not subject to a development plan, diagrammatic plan, schematic development plan, or project plan.

2. The site plan meets all of the requirements of the zone in which it is located, and where applicable conforms to an urban renewal plan under Chapter 56.

An urban renewal plan is not applicable to the 9800 Medical Center Drive site.

Development Standards

Pursuant to Section 7.7.1.B.3.a., a provision of the current Zoning Ordinance, this Site Plan Amendment was reviewed under the standards and procedures of the Property's zoning in effect on October 29, 2014, in the former Ordinance. Because the Amendment is for a parking lot expansion the applicable development standard is required off-street parking.

General Requirements

Per Section 59-D-3.0, development in the LSC Zone must comply with the several general requirements, including master plan conformance, the purpose of the LSC Zone in Section 59-C-5.47 and required off-street parking in Section 59-E:

Table 1: Development Standards Data Table - LSC Zone Standard Method of Development

Development Standard	Allowed/Required	Proposed
Parking [Sec. 59-E-3.2]		
Minimum (2.9 spaces/1,000sf GFA)	648 ⁵	581

The Ordinance requires site plan review for Applications using the Standard Method of Development, such as this Application. The proposed addition of 117 off-street parking spaces is consistent with the purpose of the LSC Zone in that it will support research, academic and clinical facilities that advance the life sciences, health care services and applied technologies at the Property where the tenants at the four buildings have had an increase in employees. The required off-street parking will be met because the 581 proposed spaces are within the established range for sites with office uses, with 648 spaces being the maximum in 1995.

3. The location of buildings and structures, open spaces, landscaping, recreational facilities, and pedestrian and vehicular circulation systems are adequate, safe and efficient.

a. Structure Location

Because the proposed parking lot is not a structure, its location is not applicable in this finding.

b. Landscaping and Lighting

The proposed landscaping will address a 15 percent afforestation requirement of Site Plan No. 819950450. The required 15 percent afforestation will be met with 38 trees with a total canopy coverage of 23,264 square feet of tree canopy, 8,949 square feet more than the 14,315 square feet of canopy coverage provided by the existing 28 trees that will be removed to accommodate 117 new off-street parking spaces. The remaining proposed landscaping will create a visual screen at the new parking lot edge.

The Lighting Plan will provide new light fixtures in the expansion area for a continuation of the outdoor lighting currently provided at the Property. The Applicant is required to have a qualified professional certify that the lighting levels are within national standards (Illuminating Engineering Society of North America (IESNA)), prior to approval of the Certified Site Plan. When the IESNA standards are met, the exterior lighting provisions will be adequate, safe and efficient.

c. Pedestrian and Vehicular Circulation

The proposed parking lot expansion will improve the pedestrian and vehicular circulation. One existing sidewalk segment in a landscape island will be relocated and retrofitted with ADA-compliant handicap ramps at both ends, where such ramps are currently not provided. The additional parking spaces and driveway aisles will contribute to better vehicular circulation and make this system adequate, safe and efficient.

⁵Based on the parking requirement for office uses, minus a 100-space parking waiver (reduction) granted by the Planning Board in the approval of Site Plan No. 819950450.

4. Each structure and use is compatible with other uses and other site plans and existing and proposed adjacent development.

The proposed expansion of parking spaces will be compatible with other uses (those being surface parking lots in vicinity of the Property at Shady Grove Adventist Hospital and Fire Station #32) and other site plans and existing and proposed adjacent development.

5. The site plan meets all applicable requirements of Chapter 22A regarding forest conservation, Chapter 19 regarding water resource protection, and any other applicable law.

d. Forest Conservation

Staff approved an exemption from the requirements of Article II of Chapter 22A, Forest Conservation, under Section 22A-5(t) (modification to an existing non-residential developed property) on May 16, 2016, in No. 42016180E (Attachment 5). The proposed Site Plan Amendment is in compliance with the requirements of Chapter 22A.

e. Environmental Guidelines

A Simplified NRI approved as part of the Forest Conservation Exemption request shows a stream and stream buffer, wetland and wetland buffer on the western portion of the Property. The proposed limits of disturbance (LOD) for the Amendment do not encroach on any of these environmentally-constrained areas. The Applicant's proposal is therefore, in compliance with the Guidelines for Environmental Management of Development in Montgomery County (*Environmental Guidelines*).

f. Final Water Quality Plan

This Site Plan Amendment is within the Piney Branch SPA. A Final Water Quality Plan has been submitted as required for development in an SPA by Article V of Chapter 19, Erosion, Sediment Control and Storm Water Management. Approval authority for Water Quality Plans is split between the Montgomery County Department of Permitting Services (MCDPS) and the Montgomery County Planning Board. The MCDPS's approval authority includes performance goals or criteria for the approved best management practices (BMPs); the BMP monitoring plan (if required); the Stormwater Management Concept Plan; and the Erosion and Sediment Control Concept Plan. The Applicant's Water Quality Plan includes an approval letter from MCDPS for their portion of the Water Quality Plan review (see Attachment 6).

The Planning Board reviews Water Quality Plans for conformity with the *Environmental Guidelines* and for conformity with any policy or requirement for SPAs in master plans, watershed plans, development plans, or the Comprehensive Water Supply and Sewer System Plan. In the case of the Piney Branch SPA, this includes making a finding that new impervious areas have been minimized.

The submitted Water Quality Plan calculates that the total property area is 790,070 square feet, of which, 371,414 square feet currently are covered with impervious surfaces, for a total imperviousness of 47.0 percent of the Property. The Applicant's proposal for 117 additional parking spaces would add 20,686 square feet of new impervious surfaces, increasing the total site imperviousness by 2.6 percent to 49.6 percent (392,100 square feet). The Applicant has an approved Preliminary Plan No. 120110080 for a future phase of development that will substantially increase the

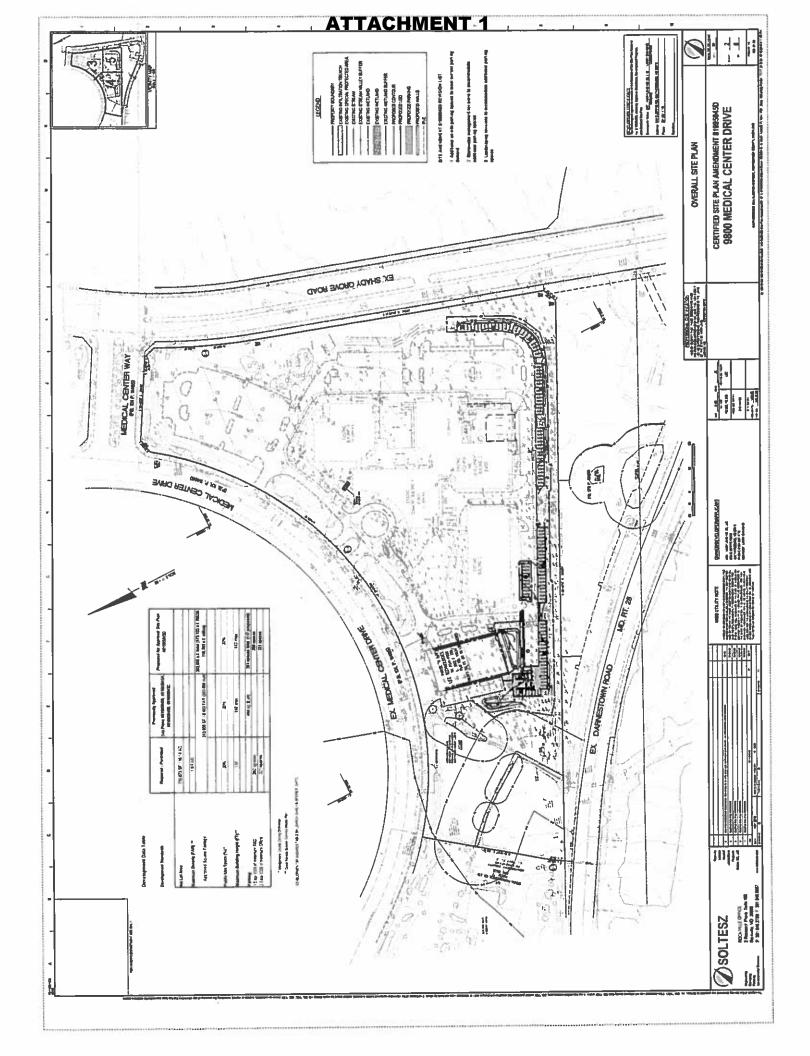
developed density at the Property. The areas proposed for the new parking spaces in this Application are mostly located within the proposed footprint of future development, including the proposed parking garage, parking lot, and infill buildings on the existing surface parking. Therefore, the Applicant's proposal for an expansion of the parking lot is consistent with Preliminary Plan No. 120110080 for future development on the Property. A new Water Quality Plan will be required when the Site Plan is submitted for development of Buildings E and F and the seven-level parking garage approved in Preliminary Plan No. 120110080. Staff finds that the additional (interim) increment of imperviousness associated with this Limited Site Plan Amendment is minimal, and will eventually be covered with future development anticipated in the approved Preliminary Plan No. 120110080. Staff therefore concludes that new imperviousness is being minimized, and recommends approval of the Water Quality Plan for Site Plan Amendment No. 81995045D.

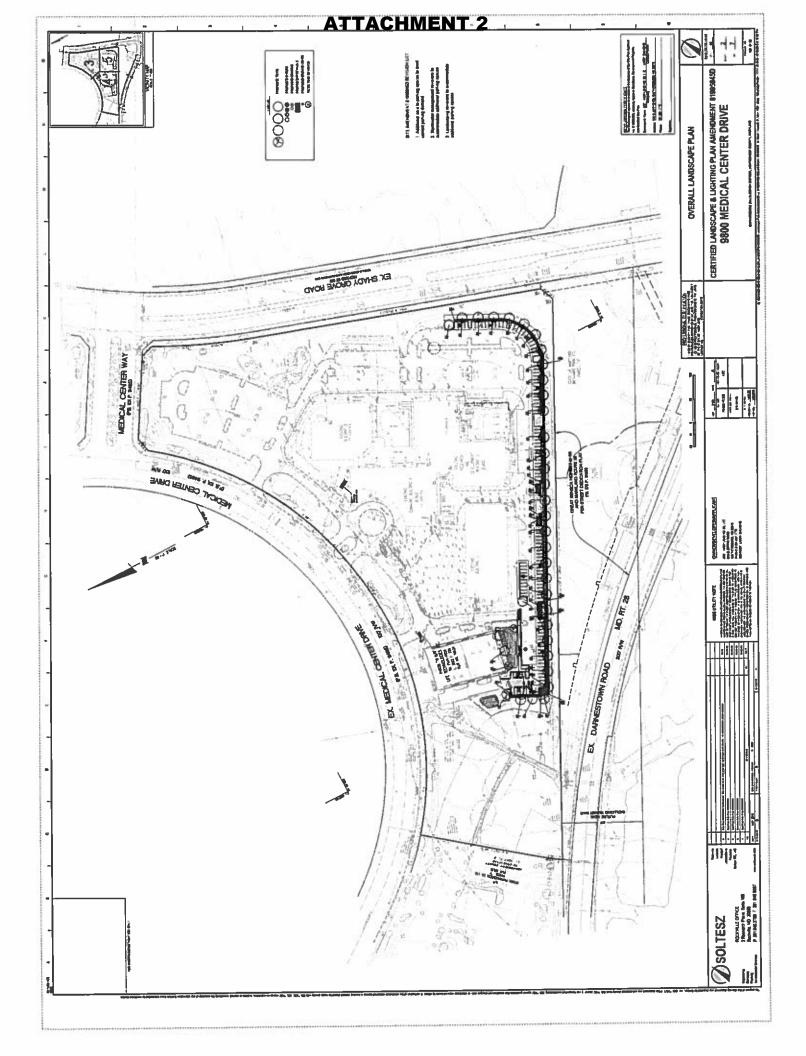
CONCLUSION

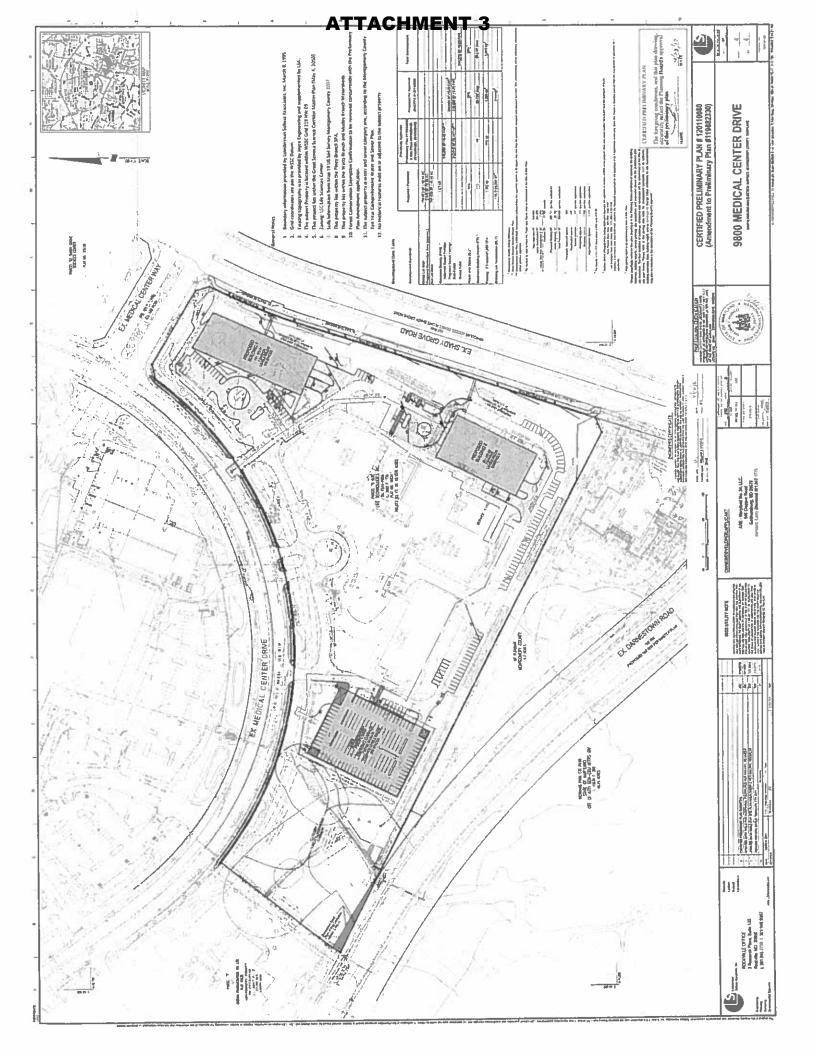
Based on the review by Staff and the other relevant agency (Attachment 6), and the analysis contained in this report, Staff finds that Limited Site Plan Amendment No. 81995045D meets all required findings and is consistent with the applicable Zoning Ordinance standards and general requirements. Staff recommends approval subject to the conditions at the beginning of this report.

Attachments

- 1. Site Plan
- 2. Landscape Plan
- 3. Preliminary Plan No. 120110080 with future buildings
- 4. GSSC Master Plan references
- 5. Forest Conservation Exemption letter
- 6. Stormwater Management Concept acceptance letter







ATTACHMENT 4

environmentally conscious design, social equity, and renewable energy sources. The compact, walkable, and green community envisioned for the plan area integrates many aspects of sustainability. It accommodates new residents and businesses while reducing land consumption and vehicle miles traveled, thereby reducing the carbon footprint from new development in the County.

Urban development patterns served by transit can reduce dependence on the automobile. Outside of the Belward site, most new development will take place over existing surface parking lots. An expanded street grid with adequate sidewalks and street trees along with the LSC Loop will encourage people to walk or bicycle to local services or destinations. Energy conservation, onsite energy generation, or renewable energy sources will reduce the costs of energy transmission and the carbon footprint of the new development. Energy efficient building design will reduce energy costs for building materials and energy usage. On-site stormwater management improves water quality and quantity. Street trees add to the tree canopy and reduce the heat island effect. Mixed uses put services in easy reach of residents. New residential development will provide more affordable housing and expand opportunities for economic diversity located near transit and services.

Sustainable development first preserves existing resources and then improves environmental conditions.

Resource Protection and Preservation

This Plan recommends ways to restore environmental functions in the Plan area as it redevelops, including: water quality protection (intercepting, detaining, evaporating, transpiring, and filtering precipitation and infiltrating it into ground water tables, preventing erosion and sedimentation, controlling flooding), air quality protection (filtering pollutants from air, producing oxygen), climate protection (sequestering and storing carbon, reducing urban heat island effect), protection of biological diversity (provision of habitat), and health benefits (clean air and water, recreational benefits, mental health benefits). Redevelopment of already disturbed areas will avoid losses of natural resources in the outer portions of the County. To preserve and enhance natural resources and their associated functions in the Life Sciences Center, this Plan:

- Creates a local street network that avoids impact to natural resource areas as much as possible (see page 53).
- Recommends that facility plans for any new roads minimize impacts to existing resources.
- Recommends creation of the Life Sciences Center Loop (see page 32). Existing natural resource
 areas are preserved through the Planning Board's Environmental Guidelines and connected by
 the LSC Loop.
- Where possible, use required forest and tree planting to enhance and expand existing resources.

Water Quality

Wherever development occurs, water quality impacts result primarily from the creation of impervious surfaces that seal off the soil layer and remove forests and tree canopy. Increases in imperviousness and decreases in forest cover have been associated with declines in water quality. Pollution from vehicles and road salts accumulates on roads and parking lots, and is washed off and carried into nearby streams in rain and snow events. In summer, rain water is heated on contact with unshaded impervious surfaces, creating temperature spikes in aquatic systems that can be damaging to aquatic organisms. Rainfall and snowmelt runs off impervious surfaces quickly, creating erosive flows that damage streams and carry harmful sediments into streams, rivers, and the Chesapeake Bay. Infiltration is the most difficult of the environmental functions to restore, as it requires reconnecting runoff with the soil. Approaches for improving water quality in urbanizing areas should recognize opportunities presented by both horizontal and vertical surfaces at various levels throughout the development.

Many of the techniques recommended in this Plan are included in the Environmental Site Design (ESD) stormwater treatment approaches now required by State and local laws and regulations. In addition, the County will be undertaking retrofit programs consistent with the requirements of the state stormwater permit. The result of this combination of regulation, County retrofit programs and master plan recommendations will be the restoration of natural resources and environmental functions that can be incorporated into the concentrated development pattern envisioned for this area.

To protect water quality, this Plan:

- Recommends site design and construction options that minimize imperviousness. These options include:
 - Compact development.
 - Parking options such as reduced parking requirements and the use of structured parking and/or shared parking facilities (see page 55).
- Recommends the use of bioswales, planter beds, rain gardens, pervious pavement, the
 incorporation of non-paved areas into open spaces, and similar techniques included in
 Environmental Site Design. Techniques that increase soil volume and porosity under paved areas
 are recommended to enhance infiltration opportunities.
- Recommends the use of vegetated roofs and walls.
- Recommends increasing tree canopy. Specific tree canopy goals are:
 - Predominantly commercial mixed-use areas: 15-20 percent minimum canopy coverage.
 - Predominantly residential mixed-use areas: 20-25 percent minimum canopy coverage.
 - The Belward Campus, with its specialized institutional use and protection of existing natural resources, should have minimum canopy coverage of 30 percent.

These goals should be met by combining forest conservation requirements with street tree plantings and landscaping plantings (see page 86). Public and private open space areas should strive for a minimum of 25 percent canopy coverage. Surface parking areas should meet or exceed 30 percent canopy coverage.

- Recommends incorporating tree canopy and infiltration techniques into portions of the LSC Loop that connect existing natural areas.
- Recommends incorporating tree canopy and infiltration techniques into other open spaces wherever feasible.
- Recommends landscaping with plants that do not require extensive watering or fertilization.
 Native plants that are adapted to grow in our area are preferred.
- Recommends the use of low-flow plumbing fixtures in buildings.
- Promotes using techniques that capture and re-use stormwater and/or graywater (graywater is
 water from sinks, bathtubs and showers that can be safely used for watering plants or flushing
 toilets). This may include the use of rain barrels and cisterns. These uses must be consistent with
 County health regulations.

Piney Branch SPA

Portions of the Life Sciences Center area are included in the Piney Branch Special Protection Area for water quality and contain remnants of the rare habitat provided by the serpentinite rocks that underlie parts of this area. Special Protection Areas require that a water quality plan be prepared detailing how impervious surfaces will be minimized and how advanced and redundant stormwater treatment measures will be achieved. Most of the Special Protection Area is in the LSC South District, where this Plan recommends that development be restricted to existing and approved development, with the exception of the Rickman Property. Development on this property should minimize new impervious surfaces especially on that portion of the property that drains to the Special Protection Area. A small portion of the SPA extends north of Darnestown Road into the southern portion of the LSC Central District. Most of this area is already developed.

- Future redevelopment in this area should minimize imperviousness in their site designs, particularly in the Special Protection Area (see page 50).
- Any development that involves or is adjacent to serpentinite habitat should preserve this area and provide additional buffering wherever possible.

Air Quality

Most impacts to air quality result from the operation of motorized vehicles and regional energy production involving the combustion of fossil fuels. Impacts include the emissions of precursors of ground-level ozone, volatile organic compounds, carbon monoxide, oxides of nitrogen and sulfur, and fine particulates. Amelioration of air quality impacts involves restoring air filtering and oxygen-producing functions, reducing vehicle miles traveled, and reducing use of energy produced by burning fossil fuels.

To restore air filtering and oxygen-producing functions, this Plan:

 Recommends increasing vegetation through the use of planter beds, bioswales and rain gardens, landscaping, street trees, and vegetated roofs and walls to the maximum extent feasible through aggressive application of Environmental Site Design.

To reduce vehicle miles traveled, this Plan:

- Recommends creating compact, mixed-use development that encourages and facilitates nonmotorized travel and reduces travel distances.
- Recommends providing alternatives to automobile travel, including:
 - Public transit in the form of the CCT and local bus service.
 - Incorporating trails into the LSC Loop. Trails in regulated areas such as stream buffers and forest conservation easements should be natural surface; trails outside of environmentally regulated areas may be hard-surfaced to facilitate travel by bicycle (see page 92).
 - Incorporate other pedestrian and bicycle trails throughout the Life Sciences Center, and make connections to other Countywide and local jurisdiction trail systems (see pages 92).
 - Make the existing area more walkable by improving road crossings (see page 86).
- Encourages other measures, such as the provision of bicycle parking facilities, to promote and facilitate non-motorized travel.

Climate Protection

Carbon dioxide and other greenhouse gasses are released into the atmosphere by combustion of fossil fuels to power motorized vehicles and to provide power for lighting, heating and cooling buildings and powering electronics and appliances, and by deforestation. Summertime energy use is driven higher by urban heat island effects from radiant heating of hard surfaces. Approaches to mitigating climate impacts focus on reducing energy consumption, increasing use of renewable energy, restoring carbon sequestration and storage functions, and reducing urban heat island effect.

The carbon footprint analysis contained in the Appendix to this Plan shows that, even if we cannot account for potential improvements to building and vehicle technology or behavioral changes to reduce energy consumption, per capita carbon dioxide emissions will be significantly less with compact, transit served development than would be the case if the same number of new homes and jobs were built on vacant land in other parts of the County.

Taken in isolation, the carbon footprint of new development in the Plan area will be greater than would occur under the 1990 Master Plan; however, the increase in the carbon footprint for the entire County will be less under this Plan. The compact, walkable, transit served community will enable people and employers to make even greater reductions in the carbon footprint. The following recommendations are aimed at reducing the carbon footprint through reduced energy consumption,

ATTACHMENT 5



MONTGOMERY COUNTY PLANNING DEPARTMENT THE MARYLAND NATIONAL CAPITAL PARK AND PLANNING COMMISSION

May 16, 2016

Larry Diamond ARE – Maryland No. 24, LLC 946 Clopper Road Gaithersburg, MD 20878

Re: 9800 Medical Center Drive

Forest Conservation Exemption Request and Simplified NRI/FSD No. 42016180E

Confirmed and Approved on 5/16/2016

Dear Larry Diamond:

On May 16, 2016, Development Applications and Regulatory Coordination staff of the Montgomery County Planning Department received a revised Simplified Natural Resource Inventory / Forest Stand Delineation (Simplified NRI/FSD) for 9800 Medical Center Drive. This Simplified NRI/FSD is part of a modification forest conservation exemption request to an existing non-residential developed property. The proposed activity is a modification and expansion of an existing parking area. The proposed parking improvements are within the limits of disturbance approved by Preliminary Plan No. 120110080. A new Site Plan approval is required for this project. The Exemption Request and Simplified NRI/FSD number for this project is 42016180E.

The review of the exemption request is complete. The project meets the requirements of the Montgomery County Code, Chapter 22A (Forest Conservation Law), Section 22A-5(t) for modifications to an existing, non-residential, developed property. The property is within the Piney Branch Special Protection Area but no forest will be cut or cleared as part of this project. To date, no forest has been removed from the property. The requested modification will not affect any forest in a stream buffer. Approval of a new subdivision plan is not required at this time. The project maintains the existing development and increases the net developed area by less than 50 percent.

Forest Conservation Exemption Request No. 42016180E is confirmed. The submitted Simplified NRI/FSD for 9800 Medical Center Drive is approved.

Any changes from the confirmed exemption and approved Simplified NRI/FSD may constitute grounds to rescind or amend any approval actions taken and to take appropriate enforcement actions. If there are any subsequent modifications to the approved plans, a separate amendment may be required for Montgomery County Planning Department review and approval prior to those activities occurring. If, at later date, this activity requires a subdivision plan approval, the Simplified NRI/FSD approval is voided and a forest conservation plan will have to be submitted for review and approval.

Fax: 301-495-1306

Sincerely,

Stephen Peck Senior Planner

Development Applications and Regulatory Coordination M-NCPPC - Montgomery County Planning Department

CC: Andie Murtha, SOLTESZ, Inc.

ATTACHMENT 6



DEPARTMENT OF PERMITTING SERVICES

Isiah Leggett County Executive Diane R. Schwartz Jones Director

October 17, 2016

Mr. Timothy Hoffman Soltesz 2 Research Place, Suite 100 Rockville, Maryland

> Final Water Quality Plan Request for 9800 Re:

> > Medical Center Drive

Preliminary Plan #: 1-88233

SM File #: 238926

Tract Size/Zone: 18.13 acres/LSC Total Concept Area: 1.38 acres

Lots/Block: N/A Parcel(s): WO/R

Watershed: Piney Branch

Dear Mr. Hoffman:

Based on a review by the Department of Permitting Services Review Staff, the Final Water Quality for the above mentioned site is acceptable. The Water Quality Plan proposes to meet required stormwater management goals via two micro bioretention structures. These structures will be treating runoff from existing parking areas that don't currently drain to infiltration of filtration systems and will offset the area of the proposed new parking spaces.

The following items will need to be addressed during the detailed sediment control/stormwater management plan stage:

- 1. A detailed review of the stormwater management computations will occur at the time of detailed plan review.
- 2. Landscaping shown on the approved Landscape Plan as part of the approved Site Plan are for illustrative purpose only and may be changed at the time of detailed plan review of the Sediment Control/Storm Water Management plans by the Mont. Co. Department of Permitting Services, Water Resources Section.

This list may not be all-inclusive and may change based on available information at the time.

Payment of a stormwater management contribution in accordance with Section 2 of the Stormwater Management Regulation 4-90 is not required. A BMP monitoring fee for the disturbed area in the SPA is required.

Mr. Timothy Hoffman October 17, 2016 Page 2 of 2

This letter must appear on the sediment control/stormwater management plan at its initial submittal. The Water Quality Plan approval is based on all stormwater management structures being located outside of the Public Utility Easement, the Public Improvement Easement, and the Public Right of Way unless specifically approved on the concept plan. Any divergence from the information provided to this office; or additional information received during the development process; or a change in an applicable Executive Regulation may constitute grounds to rescind or amend any approval actions taken, and to reevaluate the site for additional or amended stormwater management requirements. If there are subsequent additions or modifications to the development, a separate concept request shall be required.

If you have any questions regarding these actions, please feel free to contact Leo Galanko at 240-777-6242.

Sincerely,

Mark C. Etherlige, Manager Water Resources Section

Division of Land Development Services

MCE: me lmg

CC:

C. Conlon SM File # 238926

ESD Acres:

STRUCTURAL Acres:

1.38

WAIVED Acres: