

**PRELIMINARY
STAFF REPORT
2005 AREA PLANS REVIEW**

SUPERVISOR DISTRICT(S): Mt. Vernon

APR ITEM(S):05-IV-MV1

NOMINATOR(S): Major General Robert F. Trimble

ACREAGE: 33 Acres

TAX MAP I.D. NUMBERS: 92-4 ((1)) 82A portion

GENERAL LOCATION: East of Richmond Highway, south of Cherry Hill
Apartments

PLANNING AREA(S): IV

District(s): Mount Vernon

Sector: GROVETON (MV5)

Special Area(s): Suburban Neighborhood Areas between Beacon/Groveton and
Hybla Valley/Gum Springs CBCs (Land Area 4)

ADOPTED PLAN MAP: Public Park

ADOPTED PLAN TEXT:

Fairfax County Comprehensive Plan, Area IV, 2003 Edition, Mount Vernon Planning District as amended through 4-25-05; Richmond Highway Corridor Area, Suburban Neighborhood Areas between Beacon/Groveton and Hybla Valley/Gum Springs Community Business Centers, Land Unit Recommendation #4, page 40:

- “4. The North Hill, a part of the former Woodley Nightingale Redevelopment Area (approximately 33 acres) located on the eastern side of Richmond Highway north of the Hybla Valley/Gum Springs Community Business Center and the Woodley Hills Estates Mobile Home Park, is planned for public park for passive recreational use.”

PROPOSED PLAN AMENDMENT: Affordable dwellings at a density consistent with existing zoning with 30% of site to be public park.

SUMMARY OF PRELIMINARY STAFF RECOMMENDATION:

- Approve Nomination as submitted
 Approve Staff Alternative
 Retain Adopted Plan

CLARIFICATION OF PROPOSED PLAN AMENDMENT

The nomination proposes residential use up to 6 du/ac on 11 acres (maximum of 66 townhouse units), 1-2 du/ac on 18 acres (maximum 36 single family detached units) for a total of 102 affordable dwelling units, and retail use up to .35 FAR on five acres (76,230 square feet). With the proposed dedication of approximately 10 acres for public park, residential use would be clustered on approximately 18 acres. This clustering would result in an effective density of approximately 5.6 du/ac on 23 acres.

Because marine clay soils underlie the site in its entirety, the assumed development potential may be reduced. According to Section 2-308 of the Zoning Ordinance, when thirty (30) percent of the site contains marine clays, then only fifty (50) percent of the maximum permitted density is permitted for that area that exceeds thirty (30) percent of the total area of the lot. The ordinance allows, however, full density credit for land dedicated for public uses such as parks or schools. A thorough site planning process is needed to accurately estimate potential density at the North Hill site, but the ultimate yield is likely to be less than zoned development potential due to the presence of marine clay soils, even if a park site is dedicated.

BACKGROUND

Located on the east side of Richmond Highway, the 33 acre subject area is part of a 48.6 acre parcel owned by the Fairfax County Redevelopment and Housing Authority (FCRHA). The approximately 49 acre property was once developed with more than 550 mobile homes as the Woodley Nightingale mobile home park. In 1981, the parcel was purchased by the Redevelopment and Housing Authority. The mobile home pads were removed and a new redeveloped mobile home park that currently remains on the southern 14 acres of the site was built to accommodate 155 mobile homes. The residual 33 acres, which are the subject of the nomination, has remained vacant.

Prior to 1999, the Comprehensive Plan designated the subject property for retail and other uses along Richmond Highway, and residential use at 5 – 8 dwelling units per acre (du/ac) on the remainder of the property. The Plan also recognized that the property had severe environmental constraints because of the presence of marine clay soils. Nominations were submitted to consider the property for elderly housing and park/open space for passive recreational uses. At that time, HCD recommended the site be planned for residential use at 16-20 du/ac. DPZ staff supported alternative text that reflected a residential density of 5-8 du/ac with an option for public park for passive recreational use, and encouraged the creation of a public park in conjunction with any development. Ultimately, the Board adopted the Task Force and Planning Commission recommendations to designate the entire area as public park, citing the need to provide open space and the presence of severe development constraints.

The site is split into three zoning districts. The portion of the property fronting on Richmond Highway (approximately 5 acres) is zoned C-8 for retail uses up to 0.5 FAR. An 18 acre area is zoned R-2 for residential uses up to 2 dwellings per acre and the remaining

11 acres are zoned R-MHP for mobile home park, which allows up to 6 dwelling units per acre.

CRITICAL ISSUES

Environmental Constraints

- **Soils:** According to current Fairfax County Soils maps, almost the entire 33 acre subject area is composed of marine clays¹, with a very small amount of fill. The current mobile home park outside the nominated area on the southern portion of the property was redeveloped after structural problems occurred on that site and in the subject area. Marine Clay soils are listed as Class “A” problem soils, which are prone to slippage under certain conditions. The Policy Plan states “Marine clay soils found in the eastern part of the County and shrink-swell clay soils found primarily in the western area can cause foundation failures, cracked and shifting walls, and in extreme cases, catastrophic slope failure.” Development on these soils requires a geotechnical study to determine foundation support and slope stability as well as any engineering measures which might be required to minimize the potential for slippage. While development can still occur on these soils, findings of the geotechnical study could result in a reduction of the total unit count or intensity of development on these soils. As mentioned previously, the Zoning Ordinance contains provisions for reducing the allowable density on properties that are more than 30% constrained by environmental features including Marine Clay soils. For the constrained portion of the property exceeding 30% “fifty (50) percent of the maximum permitted density shall be calculated for that area of the lot which exceeds thirty (30) percent of the total area of the lot.”
- **Tree Save:** The subject property is vacant and covered with trees. There is a network of abandoned paved roads throughout the property which served the mobile home park which previously occupied the site. In addition, some concrete pads from the former mobile homes still exist. A county tree survey performed in the early 1990’s has indicated that there are more than 100 specimen trees fairly evenly distributed through out the property.
- **Hazardous Materials:** The subject property was previously occupied by a mobile home park, which was relocated to the south of the nominated area. A phase I environmental assessment may be necessary in order to assess and/or address

¹ Marine Clay

This unit occurs on hilltops and sideslopes in the Coastal Plain. Highly plastic silts and clays of variable thickness underlie surface silts and gravels a few inches to a few feet thick. The clay deposits consist of highly fractured and broken clays and silty clays which have a high shrink-swell potential. The depth of the seasonal high water table is variable depending on soil stratification, landscape position, and local hydrologic features such as seepage areas. Water is often perched above slowly permeable subsurface strata. Depth to hard bedrock is generally greater than 50 feet. Slope instability and poor foundation support are major problems requiring intensive geotechnical analysis. Numerous structures have sustained damage from inadequate construction practices. Septic drainfields and infiltration trenches are poorly suited because of plastic clays, perched water table, and unstable slopes.

potential soil contamination as well as the existence of underground propane tanks used for the mobile homes.

- **Additional cleanup:** The subject property is currently vacant and there is evidence that it has been used for dumping of construction and other debris in various locations throughout.
- **Noise:** The western edge of the property may be affected by transportation-generated noise from Richmond Highway. Noise studies may be required for any noise sensitive uses which might be proposed for this land area to determine the extent of impacts and any proposed mitigation measures which might be applied.
- **Watershed:** The subject property is in the Little Hunting Creek Watershed. The Fairfax County Physical Stream Assessment (published in 2004) rates this watershed as having poor habitat quality (on a scale ranging from very poor to excellent). The 2001 Fairfax County Stream Protection Strategy Baseline Study classifies this area as Level II. The primary goal for this category is to “Maintain areas to prevent further degradation and implement measures to improve water quality to support or comply with Chesapeake Bay Initiatives, Total Maximum Daily Load (TMDL) regulations and other water quality initiatives and standards.”
- There are no Resource Protection Areas (RPAs) on the subject property.

Based on this preliminary evaluation of the environmental issues, any proposal for future development of this land area or any part of this land area would likely require further review by staff at the time an application for development is submitted.

Affordable Housing

As mentioned previously, the site is owned by the Fairfax County Redevelopment and Housing Authority (FCRHA) and was purchased with Community Development Block Grant (CDBG) funds for the purpose of providing affordable housing. The availability of affordable housing is a significant issue in Fairfax County. The Policy Plan includes the following policies to meet the objective of increasing the supply of affordable housing in the county:

- “Policy e. Give priority for the use of County and other government-owned buildings and land as sites for the provision of affordable housing.
- Policy f. Promote and facilitate innovative site design and construction techniques, as well as encourage the use of manufactured housing and manufactured housing components, when aimed at providing affordable housing.
- Policy g. Support the efforts of the Fairfax County Redevelopment and Housing Authority in producing a portion of these affordable housing units

through the provision of County resources and the approval of suitable housing sites.”

The FCRHA supports the Plan nomination, which could be implemented as a mix of uses utilizing the density of the site, with 30% of the site, or approximately 10 acres, preserved as a treed park open space. A change in use under the Comprehensive Plan would be a desirable alternative to the current language in the Plan and would facilitate the FCRHA in completing its vision for North Hill.

The current Plan language is viewed to be inconsistent with the federal Community Development Block Grant (CDBG) funding used to purchase the property. CDBG funds are used to serve low and moderate income households with incomes less than 80% of the area median income. With innovative land planning, which the new Plan text supports, the redevelopment of this parcel would enhance the surrounding neighborhoods and the Mount Vernon District community. Developing up to the density provided by the existing zoning could protect a number of hardwood trees and maintain topography, providing trails to connect surrounding neighborhoods. Correctly implemented, this plan would further enhance the ongoing revitalization of the Richmond Highway corridor and would address the County’s priority to provide affordable housing.

Parks

The Park Authority strongly recommends the existing Plan recommendations that designate the subject property for public park for passive recreational use should be retained. Few park acquisition opportunities exist in the Richmond Highway corridor and these will diminish in the future.

The Mount Vernon Planning District is served by 34 Local Parks and 3 District and Countywide Parks totaling 572 acres. Facilities within these parks do not meet service level standards established by the Park Authority through the Needs Assessment study. Below is a table illustrating areas in which the Planning District is deficient in park facilities.

Park Facility	2004 Deficiency	2015 Projected Deficiency
Local Parkland	52 acres	132 acres
District & Countywide Parks	766 acres	976 acres
Rectangle Fields	14	20
Adult Baseball	1	2
Adult Softball	3	4

The proposed increase in local population will increase the public need for parks and park facilities. This site offers a unique opportunity to provide a highly needed open space and recreation resource. Development of recreational facilities such as fields and trails, as well as preservation of the treed areas would be an asset to the community.

Schools

The proposed plan amendment for a total of 102 units, consisting of both single family and townhouse unit types, could yield a total of 41 students. There are no significant capacity deficits existing or projected for the receiving schools.

School Attendance Pyramid Impact

School Pyramid	9/30/05 Capacity	9/30/05 Membership	2006-2007 Membership	Memb/Cap Difference 2006-2007	2010-2011 Membership	Memb/Cap Difference 2010-2011
West Potomac HS	2200	2062	2026	174	1794	406
Sandburg MS	1400	1079	1101	299	1002	398
Bucknell ES	289	296	290	-1	298	-10

EXISTING ZONING - Residential, Max. 36 SFD Units

SCHOOL LEVEL	UNIT TYPE / SINGLE FAMILY RATIO	MAX. NUMBER OF UNITS	MAXIMUM STUDENT YIELD
ELEMENTARY	0.244	36	9
MIDDLE	0.07	36	3
HIGH	0.145	36	5

EXISTING ZONING -Residential, Max. 66 SFA Units

SCHOOL LEVEL	UNIT TYPE / TOWN HOUSE RATIO	MAX. NUMBER OF UNITS	MAXIMUM STUDENT YIELD
ELEMENTARY	0.21	66	14
MIDDLE	0.053	66	3
HIGH	0.109	66	7

Transportation

The Plan amendment nomination proposes residential use that would result in a maximum of 102 dwelling units on approximately 55 percent of the property at an effective density of approximately 6 du/ac. The balance of the property would be planned as a public park or remain as C-8 zoning. The table below shows the estimated increase in trips from this proposal (note that the public park and/or C-8 zoned area are excluded from the analysis).

Should the nomination be supported, Plan text should be crafted to specify that access for the residential uses be directed to/from Dart Drive (extension of Lockheed Boulevard east of Richmond Highway). The C-8 zoned area should be buffered from the residential areas, with access from Richmond Highway. Access should be coordinated with VDOT median break spacing plans for the Route 1 widening project. If the balance of the property is developed into a public park, pedestrian access from the residential areas to the park should be provided. Vehicular access from the residential areas should be also desirable, so that residents are not forced to travel on Richmond Highway to access the park. Vehicular and

pedestrian access to the North Hill property should be coordinated with VDOT and County plans for the improvement of Richmond Highway.

Right-of-way along the southern boundary of the property should be provided to allow for the future extension of Arlington Drive to meet Richmond Highway at its signalized intersection with Lockheed Boulevard and Dart Drive. This will facilitate traffic circulation in this area, and allow residents improved access to shopping and other services.

Transportation improvements associated with development of the subject parcels, particularly those related to access, would need to be addressed at the time of rezoning.

Trip Generation Estimates for PA S05-IV-MV1 (North Hill)

<u>Scenario</u>	<u>Daily</u>	<u>AM Peak Hour</u>		<u>PM Peak Hour</u>	
		<u>In</u>	<u>Out</u>	<u>In</u>	<u>Out</u>
<u>Current Plan</u>					
Public Park (33 acres)	75	-	-	-	-
<u>Proposed Plan</u>					
36 SFD dwelling units	344	6	20	23	13
66 TH dwelling units	554	7	28	77	15
Public park (5 acres)	<u>11</u>	<u>-</u>	<u>-</u>	<u>-</u>	<u>-</u>
Total	909	13	48	50	28

Note: Trip generation was estimated using rates from the Institute of Transportation Engineers (ITE) Trip Generation report, 7th edition, 2003. Trip generation for the public park is estimated to be negligible if developed as passive open space.

CONCLUSION

This nomination represents several competing County objectives that might be achieved through the development or preservation of this site. As a property owned by FCHRA, it provides an opportunity for development of future affordable housing. It also represents an opportunity for the conservation of scarce open space and the provision of park facilities in the Richmond Highway area. There is a significant and growing need for affordable housing in this area and throughout the county, but the deficit of park land in the area, as well as environmental conditions are well documented. The redevelopment and development of land for residential use has produced units that are beyond the ability of low to moderate income families to afford. Development of these units could address some of this need to provide housing for lower wage earners who are a necessary part of the workforce. With respect to parks use, since the area was replanned for public parks use in 1999, the population of the Richmond Highway Corridor has significantly increased, while the commensurate increase in recreation and open space has not been achieved. If properly

improved and maintained, this extremely visible site could serve as a valuable park asset for a growing population in an area experiencing a severe deficit of parks.

The current Plan recommendation for public parks does not reduce zoned, by-right development potential, but the guidance would not support increases that might be sought through a special exception or other zoning application. In addition, since the site is in public ownership, a development proposal would be subject to review under Section 2232 of the Code of Virginia, which requires an evaluation of the harmony with the policies of the Comprehensive Plan, as a feature shown of the Plan or in terms of compatibility with character extent and location. Since the area is planned for a passive public park, a question of consistency with Plan guidance may arise. The nomination seeks to meet both affordable housing and park needs through encouraging a creative solution to provide both.

To envision how this might occur, staff considered various locations for the residential and parks uses suggested by the nomination. The topography of the site is flattest along Richmond Highway, in a small portion of the site adjacent to the Bryant Education Center and in the southeast corner adjacent to the existing mobile home park. The degree to which development is located toward the center of the site will increase land disturbing activities, and disruption of the site's most attractive features. It is assumed that stabilization to ameliorate soil instability will be a costly undertaking on any part of the site.

Highway noise is an issue that will affect the location of residential use, and projected increases in noise levels along Richmond Highway suggest that residential uses in this area are not as desirable as other parts of the property. Based on these factors, clustering development close to the Bryant Education Center to the north and in the southeast portion of the site seems preferable as residential use in these areas would also least impact slopes and trees, and would avoid being subject to highway noise impacts.

Access to residential development and creation of attractive living environment were also considered. With respect to the area closest to the Bryant Education Center, residential development would be isolated on the site and require the construction of new streets. The area closest to the existing trailer park could be accessed through the improvement of the existing Dart Drive, be blended with the surrounding communities and would be the least impacted by noise from Richmond Highway. This location would also preserve the wooded area along Richmond Highway and contribute to creating a visible public park in this area. With this consideration in mind, the area closest to Dart Drive in the southeast portion of the site is most suitable for further consideration.

The nomination suggests clustering the units and limits housing to single-family townhouse and detached units. Given the small size (approximately five acres) of the possible land area suitable for residential use under this preliminary recommendation from staff, the type of housing unit should not be specified in order to give FCRHA the maximum flexibility in choosing unit types that minimize land coverage.

RECOMMENDATION

Based on the previous discussion, developing the site primarily to supply affordable housing and limiting park space to 10 acres discounts other important environmental and parks goals. While the need to provide affordable housing is acute, there should be recognition of the need to provide park land, to preserve open space, and to respect environmental constraints, especially on highly visible land with valuable and fragile environmental features. However, recommending limited residential use in the southeast portion of the property which has existing access, and could be blended with the surrounding community, may be appropriate. The development could function as compatible infill, while preserving the balance the property for parks and passive open space. A passive park that preserves the natural features and visibility of the site and respects the need to create affordable housing could both be realized. Staff recommends a reduction in the planned number of units and supports Plan guidance that these units be clustered along the southeastern portion of the property, with conditions to guide density, location and preservation of open space.

“4. The North Hill, a part of the former Woodley Nightingale Redevelopment Area (approximately 33 acres) located on the eastern side of Richmond Highway north of the Hybla Valley/Gum Springs Community Business Center and the Woodley Hills Estates Mobile Home Park, is planned for public park for passive recreational use. As an option, the site is planned for a density of 2-3 dwelling units per acre provided that residential use is clustered on an area of approximately five acres located in the southeast portion of the site. Given the environmental constraints and the need for compatible infill development it should be assumed that development at this recommended density range may not be feasible and that the actual density that can be supported at this site could be significantly less. Any development must be supported by a geotechnical study that shows how slopes and problem soils will be addressed. In addition, the following conditions must be met:

- Residential building height is limited to 3 stories;
- The remainder of the site is preserved as passive park with trails connecting to the surrounding areas;
- A tree save plan is developed for the park to address preservation of all specimen trees;
- Residential uses are directed to/from Dart Drive; and,
- Right-of-way along the southern boundary of the property is provided to allow for the future extension of Arlington Drive to meet Richmond Highway at its signalized intersection with Lockheed Boulevard and Dart Drive.”

Plan Amendment S05-IV-MV1 (North Hill) Tax Map Parcel 92-4 ((1)) 82A (pt.)



Current Plan: Public Park (~33 ac.)
 Proposed Plan: Residential use 5-8 du/ac (max. 6);
 Residential use 1-2 du/ac and Public Park
 with conditions

Legend

-  Subject Area (~33 ac.)
-  Parcels_Solid
-  R-MHP (~32% or 11.0 ac.)
-  R-2 (~54% or 18 ac.)
-  C-8 (~14% or 5 ac.)

