5. PARKS AND ECOLOGICAL RESOURCES

Board of Supervisors Environmental Vision:

"Parks, trails, and green space provide habitat and other ecological resources that promote the physical and mental well-being of residents through supporting healthy lifestyles and allowing for interaction with our natural environment... Ecological resources that include the soil, water, air, plants, animals, ecosystems and the services they provide are considered natural capital and green infrastructure. The public, or ecosystem, services provided by this green infrastructure are often more cost-effective than the engineered alternatives, and thus are managed as any other infrastructure or capital asset through deliberate inventory, planning, maintenance, enhancement, and restoration to ensure healthy, high functioning, and resilient ecosystems and environment. Maintaining healthy, natural ecosystems is a priority of Fairfax County."

INTRODUCTION

Fairfax County contains roughly 226,655 acres of developable land². The county's ecological resources, owned by different entities, are dispersed across this acreage. This chapter will focus on the health of the county's natural ecosystems with an emphasis on the plant and tree components of green infrastructure described above in the Board's Environmental Vision (whereas Water and Wildlife Resources are addressed in other chapters). The topic of trails, as it relates to the environment, is generally covered by the Transportation chapter.

How Land is Used

As the county seeks to maintain healthy, natural ecosystems, the way land is used and developed is a critical aspect to consider. The following three classifications of land use account for nearly 80 percent of the land in the county:

- Parks and recreation (15.3 percent; 34,584 acres)²
 - Most of this acreage is owned and managed by the Fairfax County Park Authority (FCPA) (23,636 acres in 2023³) and the Northern Virginia Regional Park

¹ 2017 Fairfax County Environmental Vision, Section 2 E "Parks and Ecological Resources" http://www.fairfaxcounty.gov/environment/sites/environment/files/assets/documents/pdf/environmental-vision-2017.pdf#page=30

² 2022 Land Use and Zoning Data, Acres of Land by Existing Land Use Category (Planning District, Supervisor District & Human Services Region); Acreage does not include areas of roads (which generally increase each year as land is developed and therefore county acreage decreases), water, or small areas of land unable to be zoned or developed. Data provided via email by Department of Management & Budget's Xuemei Han (https://www.fairfaxcounty.gov/demographics/find-data-topic).

³ FCPA acres as listed in the FY24 budget: https://www.fairfaxcounty.gov/budget/sites/budget/files/assets/documents/fy2024/adopted/volume1/51.pdf

Authority (NOVA Parks) (8,591 acres in 2023⁴).

- Vacant or natural (5.3 percent; 12,051 acres)²
 - This land decreased 438 acres when compared to January 2021 and 1,751 acres between 2017-2022 due to growth pressures within the county as it is zoned for residential, industrial, or commercial uses and continues to be developed.
- **Residential** (59.3 percent; 134,389 acres)²
 - This significant percentage underscores the impact that private property can have on our environmental services and natural capital. Residential property in the county increased 361 acres since January 2021 and increased by 1,445 acres between 2017-2022.

While not all the acreage described above can be considered equally valuable as natural habitat, all areas—including active recreation areas, private open space, county and school properties, and residential areas—can each enhance the environment (e.g., by reducing stormwater runoff, adding trees) if properly managed and/or designed. Furthermore, the many economic, social, and health benefits that ecological resources provide cannot be overlooked.⁵

Organizations of Note

A wide variety of organizations and programs impact Fairfax County's ecological resources with a broad set of stakeholders including federal, state, local, non-profits, and private landowners. This chapter provides a reference list of organizations in the "Additional Information" section.

Ecological Resources on Non-Park Land

With most land in Fairfax County classified as "non-park" land (e.g., residential, government-owned, and commercial), the linkage between regulations, land use decisions, and the county's broader ecological resources is a critical consideration for the ecological health of the county.

Doug Tallamy, professor of Entomology and Wildlife Ecology at the University of Delaware and author of <u>Bringing Nature Home</u>, addresses the potential of private land to be an ecological resource: "Lawn should not be our default landscaping practice. If we cut the 45.6 million acres of lawn [in the U.S.] in half, we could create the equivalent of a new national park that is 20 million acres in size. That alone would create the biggest natural area in the nation, bigger than most of our national parks combined."

A variety of ordinances and policies provide guidance for private property owners on topics which directly impact Fairfax County's ecological resources. This chapter provides a reference list in the "Additional Information" section.

CURRENT CONCERNS

⁴ NOVA Parks acres as listed in the FY24 budget:

https://www.fairfaxcounty.gov/budget/sites/budget/files/assets/documents/fy2024/adopted/cip/8-nvrpa.pdf

⁵ Green Cities: Good Health (washington.edu)

⁶ https://www.highcountrygardens.com/gardening/bringing-nature-home-interview-with-doug-tallamy/

As the county continues to develop land, it is important to actively preserve, protect, enhance, and expand its current park land and tree canopy, not only for the enjoyment of residents but also as a climate and resiliency strategy. County government plays an important role in preserving and protecting ecological resources, particularly on private land, through its site planning process. In all these efforts, it is important to consider the quantity, quality, and equity of the county's tree canopy to improve air and water quality as well as to help mitigate climate crisis impacts, such as heat island effects and increased stormwater runoff.

Tree Canopy

Reporting on Tree Canopy Coverage

The 2011-2015 Land Cover Change Analysis⁷ from 2017 reports that Fairfax County, at that time, had a 57% canopy coverage. A more recent 2021 study conducted by Casey Trees⁸ showed 53.6% canopy coverage and a 0.3% decrease in tree canopy (633 acres) between 2014-2018. However, because analyses of tree canopy vary in their methodology and which underlying data is being used, these two reports cannot be compared directly.

As of August 2023, UFMD was awaiting tree cover analysis by the County's non-profit partner Casey Trees using National Agriculture Imagery Program (NAIP) 0.6 meter land cover data. The data will provide the first chance to view tree canopy changes between 2012 and 2021 from a consistent, comparable dataset. Staff are using quality assurance technics to ensure data accuracy and appropriate for use as a policy and program metric. Publication of the data is scheduled for the fall 2023. Drawing from this publicly accessible data set in the future should also allow for future changes to be directly compared.

A Note About Reporting on Tree Canopy Coverage

One note of concern about tree canopy reporting is the limitation of the current technology. Current imagery can be interpreted to measure canopy coverage (quantitative) but it cannot today report on canopy *quality*. For example, invasive vines (which threaten tree canopy) and invasive trees such as Callery pears and Tree of Heaven show up as tree canopy coverage the same as a native oak tree. As such, interpretation of current and upcoming reports must be carefully considered. The 2017 i-Tree Eco Urban Forest Assessment reported on field study data from 2009-2010 of 204 plots across the county. This on-the-ground sample data can help the county extrapolate quality, however this data too must be kept current to be most useful. An updated i-Tree report analyzing data from 2017 is expected in late 2023 or early 2024.

Tree Canopy Concerns

EQAC commends the county for tree canopy being an important component of CECAP as well as Resilient Fairfax. One of CECAP's sector goals proposes that Fairfax County expand the tree canopy to 60% with a minimum of 40% tree canopy coverage in every census tract by 2030 and a minimum of 50% tree canopy coverage in every census tract by 2050, prioritizing areas of

⁷ Page 4: https://www.fairfaxcounty.gov/publicworks/sites/publicworks/files/assets/documents/tree-canopy-report-2015.pdf#page=4

⁸ https://caseytrees.org/treereportcard2021/

highest socioeconomic need first⁹. Similarly, in Resilient Fairfax, the goals incorporated in "Adaptive Environments Implementation Roadmaps"¹⁰ include a focus on enhancing the county's tree canopy. The following are three top concerns regarding tree canopy:

• Healthy, equitable tree canopy

Without regular data updates *and* analysis, the county lacks a critical tool needed to achieve a healthy, native tree canopy that, in the spirit of One Fairfax, is equitably distributed across the county to ensure all residents reap the benefits of tree cover. EQAC appreciates that Strategy IAP.2f of Resilient Fairfax calls for the county to "Continue to Collect Tree Canopy Data" – analysis of this data is equally important.

In 2021, staff in the Department of Public Works and Environmental Services (DPWES) put together an initial map ¹¹ (shown here) overlapping areas of existing tree canopy coverage with a vulnerability index that help identify areas with the greatest need of increased tree canopy. The County should seek new tree canopy data and analysis as frequently as possible to ensure maps such as these can help drive decision making.

• Authentic community connections

Outreach and engagement with communities, in areas where additional tree canopy can provide the greatest impact, is critical to the long-term success of tree plantings¹². While tree planting pilot programs, such as the one that took place in the Route 1 corridor in 2021, were successful, more resources will be needed to make authentic community connections to facilitate additional successful plantings. EQAC commends UFMD for applying for a United States Department of Agriculture (USDA) Forest Service Urban and Community Forestry grant for \$11,500,000 to fund the establishment of a street tree planting program to reduce urban heat islands. (Grantees will be announced in the fall of 2023.) EQAC encourages the county to continue to pursue grants as per Strategy IAP.3b of Resilient Fairfax as authentic community engagement requires consistent re-investment of resources.

• *Improving land development*

As properties continue to develop and re-develop, well-designed land use can contribute to a healthy ecology. This topic is addressed in the Land Use chapter in greater detail, but it is worth noting here that concepts such as biophilic designs¹³ can significantly enhance an area's natural resources. The following are four key areas for consideration:

While the county has a 10-year tree canopy requirement, without analysis of its effectiveness, it is not possible to know if we are achieving the tree canopy proposed in development plans. A graduate student at Virginia Tech is working with Casey Trees, using data from Fairfax County, to analyze development plans from 2012 versus current

⁹ Page 56: CECAP implementation plan; county staff noted that where this plan says "block" it should be "tract": https://www.fairfaxcounty.gov/environment-energy-coordination/sites/environment-energy-coordination/files/assets/documents/cecap/cecap/c20implementation/c20plan/c201623_a-1a.pdf

Resilient Fairfax: https://www.fairfaxcounty.gov/environment-energy-coordination/sites/environment-energy-coordination/files/assets/documents/pdf/resilient%20fairfax%20final%20carp_ada_signed.pdf#page=78
 Tree canopy & vulnerability map of Fairfax County developed by DPWES staff Yeoanny Venetsanos and Juan

¹² https://www.bloomberg.com/news/articles/2019-01-11/why-detroiters-didn-t-trust-city-tree-planting-efforts

¹³ https://www.greenroofs.com/2019/02/20/biophilia-turning-conventional-architecture-inside-out/

- conditions on the ground to see if the county has achieved the canopy coverage proposed. The results of this Master's thesis is expected to be completed in under two years, but it is unclear if the data will be publicly available.
- o In late 2022, UFMD's Forest Conservation Branch (comprised of thirteen foresters) was moved out of UFMD and into Land Development Services (LDS). This move has allowed UFMD to focus on urban forestry (and not development) which could help better to achieve the goals of new policies such as Resilient Fairfax and CECAP. We urge Fairfax County to monitor this change to be able to see what the outcomes have been.
- In late 2022, the Mount Vernon Infill Development Task Force put forth a slate of recommendations which could positively affect tree canopy. EQAC encourages the Board of Supervisors to provide directions for staff for implementation of those recommendations.
- Creating a resource which provides a comprehensive look at the county's natural resources could further inform the land development process. In that vein, EQAC appreciates Strategy AE.1a of Resilient Fairfax which calls for the county to "Develop a Consolidated Natural Resources Management Plan".

FCPA funding model

The current funding structure for FCPA continues to create challenges in supporting the long-term health of FCPA's natural resources. One-off funding sources, such as funds from proffers, donations, Environmental Improvement Program (EIP)¹⁴, and project-based bond funds, are critical under the current structure. However, project-based funding means that once a project, such as an ecological restoration, has been completed, the long-term maintenance and upkeep—managing for invasive plants, for instance—must be funded through different means. Underscoring the discrepancy in funding versus need, FCPA's 2016 Needs Assessment¹⁵ reported that an additional \$2,350 per acre of annual funding (for all 17,000 acres of natural area owned by FCPA--close to \$40M/year) would be needed to perform the necessary maintenance activities for the county's natural resources.

EQAC commends the recent allocations in the budget, beginning in FY23, in FCPA's Landscape Legacy and Sustainability Program. This recurring program funding plays a critical part in maintaining the integrity of some of FCPA's key areas into the long-term.

Particularly challenging in the current funding structure is hiring people to lead longer-term initiatives. Disparate funding avenues lead to instability and lack the long-term security needed to effectively protect natural resources. While the current funding has challenges and funding levels are not sufficient for maintaining FCPA's natural resources as documented above, these initial investments are a good start to begin to address the underfunding issue. Particularly challenging in the current funding structure is hiring people to lead longer-term

¹⁴ FY2020 EIP projects: https://www.fairfaxcounty.gov/environment-energy-coordination/sites/environment-e

¹⁵ https://www.fairfaxcounty.gov/parks/sites/parks/files/Assets/documents/plandev/parkscount/needs-assessment-plan-050616.pdf

initiatives. Disparate funding avenues lead to instability and lack the long-term security needed to effectively protect natural resources.

Ecological Corridors

The county's Comprehensive Plan¹⁶ contains strong language in support of the Board's Environmental Vision, particularly in the Environment¹⁷ section. A key objective the county should continue to focus on is identifying, protecting, and enhancing an integrated network of ecologically valuable land and surface waters for present and future residents of Fairfax County such as designating Environmental Quality Corridors (EQCs).¹⁸ While EQCs are a strong concept, it should be noted that a comprehensive, countywide GIS layer of approved and/or potential EQCs does not exist. As mentioned above, Strategy AE.1a of Resilient Fairfax (Develop a Consolidated Natural Resources Management Plan) would produce a resource to document EQCs and other ecologically important areas.

Ecological resources on private property are also worth noting here as well, as individual properties have the opportunity to be "habitat stepping stones" linking public lands as part of ecological corridors. Fairfax County may wish to consider how policy changes or incentives for private landowners may help further this goal.

On aspect that the county should consider is the equitable distribution of ecological corridors. A network of green spaces and increased tree canopy where it is lacking today would benefit residents and wildlife alike, such as in some of the county's more urban settings.

Natural Threats

The relationship between our excessive native white-tailed deer populations and non-native invasive plants is an important one to highlight in terms of how they degrade our ecological resources. When deer populations rise above the carrying capacity¹⁹ of an area, they can strip an area of native vegetation, including tree seedlings, up to a height of six feet, destroying the understory layer of the forest and preventing forest regeneration. Invasive plants, which deer do not generally eat, expand rapidly by their nature, putting further pressure on understory and forest regeneration.

Deer

This topic is addressed in the Wildlife Management chapter in greater detail. Fairfax County is the only jurisdiction in Virginia with an active deer management program, with adjacent jurisdictions not having a program or relying on the public to manage deer populations.

Non-native invasive plants
 The problem of invasive plants is systemic: many plants which would otherwise be classified

¹⁶ https://www.fairfaxcounty.gov/planning-development/fairfax-county-comprehensive-plan

¹⁷ https://www.fairfaxcounty.gov/planning-development/sites/planning-development/files/assets/compplan/policy/environment.pdf

¹⁸ Objective 9 of the Environment section of the Comp. Plan discusses EQCs: https://www.fairfaxcounty.gov/planning-development/sites/planning-development/files/assets/compplan/policy/environment.pdf#pagae=15

¹⁹ https://dwr.virginia.gov/wildlife/deer/deer-management-program/

as noxious weeds²⁰ are permitted to be sold in the landscaping trade²¹. Landowners then purchase them, dispersing them throughout the county. Unmanaged natural lands are especially impacted as wind, birds, and other forces distribute invasive plant material far and wide, disregarding property lines. EQAC appreciates the General Assembly's passage of HB2096²² which requires commercial landscapers to label invasive plants.

FCPA's Invasive Management Area (IMA) program²³ leverages the power of volunteer site leaders to lead invasive plant removals on FCPA property, providing the county hundreds of thousands of dollars in value each year. The Early Detection Rapid Response (EDRR)²⁴ program, as part of the IMA program, finds new populations of certain invasive species and aims to eradicate them before they cause serious ecological harm. The IMA program is the strongest of its kind in Northern Virginia, and yet it only focuses on a small subset of the 10 percent of land owned by FCPA.

Effectively addressing this threat requires collective action between public and private landowners. Specific needs include encouraging private landowners to address these problems on their land, facilitating improvements, and encouraging long-term management to ensure continued ecological benefits. Reston Association has set an example for others in their 2016 banning, through the covenant process, of the use of any plant on the Virginia Department of Conservation and Recreation list of invasive plants²⁵.

EQAC commends the Board's FY24 budget investments in support of the IMA program, Operation Stream Shield (which helps fight invasives), and water chestnut management. EQAC also commends the Board's new Running Bamboo ordinance which went into effect on January 1, 2023. However, it should be noted that sustained funding and resources for entities such as FCPA and UFMD will be required to combat bamboo on county-owned properties and in parks.

Non-native insects and disease

Additionally, non-native insects (e.g., Hemlock Woolly Adelgid, Emerald Ash Borer) and disease (e.g., Thousand Cankers Disease) are added or potential stressors to our native, ecological resources. Of emerging concern is the Spotted Lanternfly which was found in Fairfax County in May 2022²⁶. The invasive Tree of Heaven is problematic both as the Spotted Lanternfly's preferred host and as a generally invasive tree. Fairfax County UFMD's Forest Pest Management Branch²⁷ addresses the wide range of invasive forest pests that pose a threat to the county's urban forest.

²⁰ Virginia's noxious weeds: https://www.vdacs.virginia.gov/plant-industry-services-noxious-weeds.shtml

²¹ Virginia's law defining noxious weeds includes an exception for any plant "commercially viable or such living plant is commercially propagated in Virginia": https://law.lis.virginia.gov/vacodefull/title3.2/chapter8/

https://lis.virginia.gov/cgi-bin/legp604.exe?231+sum+HB2096

²³ https://www.fairfaxcounty.gov/parks/invasive-management-area

²⁴ https://www.fairfaxcounty.gov/parks/invasive-management-area/early-detection

²⁵ https://www.dcr.virginia.gov/natural-heritage/invsppdflist

²⁶ https://www.fairfaxcounty.gov/news/scrape-away-spotted-lanternfly and https://www.fairfaxcounty.gov/news/scrape-away-spotted-lanternfly and https://www.washingtonpost.com/dc-md-va/2023/02/01/spotted-lanternfly-fairfax-invasive-insect/

²⁷ https://www.fairfaxcounty.gov/publicworks/trees/forest-pests

RECOMMENDATIONS

The Scorecard for this Annual Report on the Environment (ARE) contains the following recommendations pertaining to this chapter. Please see the Scorecard for details.

Five recommendations are the focus of the Parks & Ecological Resources chapter this year:

- Recommendation: 5PER-2023.1 Ensure Equitable Investment in Ecological Restorations and Corridors
- Recommendation: 5PER-2023.2 Invest in Authentic Community Connections to Achieve a Healthy, Equitable Tree Canopy
- Recommendation: 5PER-2021.4 Strengthen Authority to Address Management of Invasive Species Throughout the County
- Recommendation: 5PER-2022.1 Support Additional Staffing for Urban Forest Management Division (UFMD)
- Recommendation: 5PER-2021.3 Seek More Stable Funding Sources for Fairfax County Park Authority (FCPA) Initiatives

This prior recommendation has been closed as requests for improving this process are being pursed via the Tree Commission.

• Recommendation: 5PER-2021.2 Improve the Land Development Process by Prioritizing Trees

ADDITIONAL INFORMATION

List of Organizations Impacting Ecological Resources

Various organizations and programs impact Fairfax County's ecological resources. This list is provided to demonstrate the distributed nature of our county's ecological resources and to provide context to the wide variety of entities involved in influencing their preservation:

Key County Organizations / Departments

- Fairfax County Park Authority (FCPA)
- NOVA Parks
- Urban Forest Management Division (UFMD)
- Office of Office of Environmental and Energy Coordination (OEEC)

Other Governmental Agencies, Programs, and/or Properties

- Local
 - o Agricultural and Forestal Districts²⁸
 - o Fairfax County Public Schools (FCPS)
 - Policy for Environmental Stewardship (Policy #8542²⁹)

²⁸ https://www.fairfaxcounty.gov/planning-development/agricultural-forestal-district

²⁹ https://www.boarddocs.com/vsba/fairfax/Board.nsf/goto?open&id=867SG92A805A

- Get2Green³⁰ program
- o Fairfax County Wetlands Board³¹
- o Fairfax County Stormwater Management Program³²
- Land Development Services (LDS)
 - LDS administers the Public Facilities Manual³³ which covers several important environmental topics, including a section for Tree Conservation.
- o Northern Virginia Soil & Water Conservation District (NVSWCD)³⁴
- State and Federal
 - o Gunston Hall³⁵ (553 acres on the Mason Neck Peninsula in Fairfax County)
 - National Park Service
 - As of June 2015, the National Park Service held 38 conservation easements covering 326 acres in Fairfax County.
 - Virginia Department of Conservation and Recreation³⁶ (1,856 acres in Fairfax County)
 - o Virginia Department of Forestry (VDOF)³⁷
 - Virginia Department of Environmental Quality³⁸
 - Virginia Department of Transportation (VDOT)³⁹
 - Virginia Outdoors Foundation (VOF)⁴⁰
 - VOF holds seven easements covering 127 acres in Fairfax County.
 - o US Bureau of Land Management⁴¹ (800 acres in Fairfax County)
 - o US Fish and Wildlife Service⁴² (2,350 acres in Fairfax County)

Non-Profits, Homeowner Associations (HOAs), and related initiatives

- Earth Sangha⁴³
- Fairfax Chapter of the Virginia Master Naturalist Program⁴⁴
- Fairfax County Restoration Project (FCRP)⁴⁵
- Fairfax ReLeaf 46
- Metropolitan Washington Council of Governments (MWCOG)⁴⁷
- The Nature Conservancy (TNC)⁴⁸

³⁰ http://get2green.fcps.edu/

³¹ https://www.fairfaxcounty.gov/bacs/BoardDetails.aspx?BoardID=23219

³² https://www.fairfaxcounty.gov/publicworks/stormwater

³³ https://www.fairfaxcounty.gov/landdevelopment/public-facilities-manual

³⁴ https://www.fairfaxcounty.gov/soil-water-conservation/

³⁵ https://gunstonhall.org/

https://www.dcr.virginia.gov/state-parks/mason-neck

³⁷ https://dof.virginia.gov/

³⁸ https://www.deq.virginia.gov/

 $[\]overline{\text{https://www.virginiadot.org/programs/pr-environmental.asp}}$

⁴⁰ https://www.vof.org/resources/statistics/easements-by-locality/

⁴¹ https://www.blm.gov/office/lower-potomac-field-station

⁴² https://www.fws.gov/refuge/mason_neck/

⁴³ http://www.earthsangha.org/

⁴⁴ http://www.vmnfairfax.org/

⁴⁵ https://www.fcrpp3.org/;

⁴⁶ http://www.fairfaxreleaf.org

⁴⁷ https://www.mwcog.org/committees/regional-tree-canopy-workgroup/

⁴⁸ https://www.nature.org/en-us/get-involved/how-to-help/places-we-protect/fraser-preserve/

- o TNC owns the 233-acre Fraser Preserve on the Potomac River.
- Northern Virginia Conservation Trust (NVCT)⁴⁹
- Plant NOVA Natives (PNN)⁵⁰
- Reston Association (RA)⁵¹
 - o Beginning in 2017, RA published the Reston Annual State of the Environment Report (RASER) which evaluates the state and management of Reston's 1,300+ acres of open space, including 800 acres of woodlands, four lakes, four wetlands, three ponds, and 50 meadows.

Ordinances and Policies

Various Fairfax County ordinances and policies⁵² provide guidance for private property owners on topics including, but not limited to:

- Resource Protection Areas (RPAs) and Resource Management Areas (RMAs) located within the unincorporated areas of Fairfax County (Chapter 118, Chesapeake Bay Preservation Ordinance⁵³)
- The conservation (i.e., preservation and planting) of trees during the land development process (Chapter 122, Tree Conservation Ordinance⁵⁴)
 - o While this ordinance sets standards such as ten-year tree canopy requirements, it should be noted that, by law, LDS *can* allow development plans to take precedence over the requirements. Deviations, in whole or part, from the tree preservation target may be requested under certain conditions. Similarly, where strict application of the requirements would result in unnecessary or unreasonable hardship to the developer⁵⁵, exceptions to the tree canopy requirements can also be granted. In practice, it should be noted that the Urban Forest Management Division has been given the responsibility for the review and approval of any deviations to the tree preservation target and any modifications to the 10-year tree canopy requirement.
 - o The Tree Conservation section of the Public Facilities Manual⁵⁶ provides support for the ordinance mentioned above. It provides incentives for planting native tree species and disincentives for planting invasive tree species, to meet tree canopy requirements in all development projects.
- Mitigating the harmful effects of erosion and sediment during land-disturbing activities (Chapter 104, Erosion and Sediment Control⁵⁷)

50 https://www.plantnovanatives.org/

⁴⁹ https://www.nvct.org/

⁵¹ https://www.reston.org/nature-environmental-overview

⁵² https://www.fairfaxcounty.gov/landdevelopment/codes-and-standards

⁵³ https://www.fairfaxcounty.gov/landdevelopment/chesapeake-bay-preservation-ordinance

⁵⁴ https://www.fairfaxcounty.gov/publicworks/trees/rules

⁵⁵ Chapter 122, Section 122-2-6. - Exemptions and Modifications https://www.fairfaxcounty.gov/landdevelopment/codes-and-standards

⁵⁶ Chapter 12; https://www.fairfaxcounty.gov/landdevelopment/public-facilities-manual

⁵⁷ https://library.municode.com/va/fairfax county/codes/code of ordinances?nodeId=THCOCOFAVI1976 CH104ERSECO

- Floodplains and Environmental Quality Corridors (EQCs) for the conservation of stream valleys as well as the broader health of our contiguous natural properties (the Floodplain Ordinance is codified as part of the zoning ordinance⁵⁸; EQC Policy⁵⁹)
- Grass or lawn areas located within Fairfax County for property other than those zoned for or active in farming operation (Chapter 119, Grass or Lawn Area⁶⁰)



⁵⁸ https://www.fairfaxcounty.gov/planning-development/zoning-ordinance

⁵⁹ Objective 9 on p. 14: https://www.fairfaxcounty.gov/planning-development/sites/p

SCORECARD ELEMENTS

	Parks & Ecological Resources	Status / EQAC
	Five Active Recommendations in 2023 (One Closed)	Comments
1	Recommendation: 5PER-2023.1 (NEW)	New in 2023
	Ensure Equitable Investment in Ecological Restorations and Corridors As the county considers initiatives to invest in ecological restorations and/or improving ecological corridors, EQAC encourages the Board to direct staff to balance priorities of working to preserve ecologically important and sensitive habitats while at the same time investing in equitable investments to expand green space and ecological corridors using the One Fairfax lens. For example, FCPA's Landscape Legacy and Sustainability Program may inadvertently be deprioritizing more urbanized areas, resulting in further divestment in areas previously neglected. For restorations, particularly those in urban areas such as White Gardens, without sustained funding to maintain these areas, invasive plants quickly take over. Similarly, the county's current definition of EQCs may be interpreted to be focused only on preserving currently healthy corridors which could similarly inadvertently deprioritize urbanized or channelized waterways given their low ecological value. EQAC encourages a stronger focus on examining which programs out there today may need to be adjusted to ensure equitable investments.	NEW
	Summary of Action Taken by Agency or Department N/A	
2	Recommendation: 5PER-2023.2 (NEW)	New in 2023
	Invest in Authentic Community Connections to Achieve a Healthy, Equitable Tree Canopy Last year, one of EQAC's recommendations was "Support Additional Staffing for Urban Forest Management Division (UFMD)" (5PER-2022.1). While some new staff have been hired, the Forest Conservation Branch's move to LDS has meant that a small UFDM team remains. With a finalized Resilient Fairfax plan adopted in 2022 to complement CECAP and a focus on One Fairfax a key component of the plan, UFMD's most significant capacity needs are to invest in authentic community connections as they pursue the goal of a healthy, equitable tree canopy. Authentic engagement doesn't happen overnight or as a one-off initiative. UFDM will require further investment in this skillset and expertise to ensure trusted community connections are made in advance of tree plantings.	NEW

	Parks & Ecological Resources Five Active Recommendations in 2023 (One Closed)	Status / EQAC Comments
	Summary of Action Taken by Agency or Department N/A	
3	Recommendation: 5PER-2021.4	Making progress /
	Strengthen Authority to Address Management of Invasive Species Throughout the County EQAC commends progress in this area and continues to encourage the county to explore what it can do to provide further support holistic and equitable solutions in the management of all invasive plant species. Ideas include:	Recommended since 2021
	 Pursue state support for authority to create a special tax district to assist with funding invasive removal on private property. Seeking ways to work with developers to avoid the use of non-native invasive plants in landscaping and to include a ban on homeowner use of non-native invasive plants, similar to Reston Association, in initial covenants of new developments. Seeking authority to fund matching grants through Northern Virginia Soil & Water Conservation District to treat invasive plants. Supplementing any additional programmatic solutions with additional resources for public outreach and education about using native plants and avoiding non-native invasives. 	While the implementation of the bamboo ordinance is a positive step forward, additional measures will be needed to combat the significant backlog of management of invasives and to preserve the ecological integrity of our natural lands. Some
	Summary of Action Taken by Agency or Department The most significant progress made on this front was in 2022 when the Board of Supervisors adopted a new Running Bamboo ordinance, meant to help stop the spread of this invasive plant, which went into effect on January 1, 2023. There are no updates on other possible initiatives mentioned above.	progress here may require additional state authority.
4	Recommendation: 5PER-2021.2	Closed / Recommended
	Improve the Land Development Process by Prioritizing Trees	since 2021
	While some progress has been made in this area, new recommendations this year reframe some of the recommendations from this initial ask. One outstanding and actionable next step is for the	3
	Board of Supervisors to direct staff to take next steps on the implementation of the Fall 2022 tree-	
	related recommendations from the Mount Vernon Infill Development Task Force. Relatedly,	

	Parks & Ecological Resources Five Active Recommendations in 2023 (One Closed)	Status / EQAC Comments
	EQAC supports the Tree Commission's recommendations related to prioritizing trees during the land development process and will track progress through their efforts. EQAC will continue to monitor this and other Tree Commission comments and recommendations regarding land development concerns to determine if further EQAC's support is appropriate. Summary of Action Taken by Agency or Department Staff's 2022 responses to six recommendations included in the September 2, 2021 Tree Commission letter ⁶¹ to the Board of Supervisors indicate that some progress is being made on this front.	There is more work to be done in this area, particularly with the Mount Vernon Infill Development Task Force recommendations, and EQAC is reframing some of the asks from this prior recommendation. EQAC will also monitor Tree Commission recommendations.
5	Recommendation: 5PER-2022.1 Support Additional Staffing for Urban Forest Management Division (UFMD) As Fairfax County begins implementation of climate-focused initiatives related to natural resources, as identified by plans such as CECAP and ultimately Resilient Fairfax, UFMD's role and leadership will no doubt also continue to grow. Full-time positions, rather than non-merit or contract positions, would provide the long-term sustainability needed to support these initiatives. An additional recommendation this year (via 5PER-2023.2 (Invest in Authentic Community Connections to Achieve a Healthy, Equitable Tree Canopy)) builds on this ask from 2022. Summary of Action Taken by Agency or Department With funds from the FY23 budget, UFMD has brought on an Urban and Community Forestry Coordinator and also a Tree Planting Coordinator.	Making Progress / Recommended in 2022 This recommendation was new last year and while some new staff was brought on, more capacity is needed.
6	Recommendation: 5PER-2021.3 Seek More Stable Funding Sources for Fairfax County Park Authority (FCPA) Initiatives	Making progress / Recommended since 2021

⁶¹ https://www.fairfaxcounty.gov/publicworks/sites/publicworks/files/assets/documents/20210902 tree commission policyrecommendations.pdf

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Five Active Recommendations in 2023 (One Closed)

Budgeting challenges for FCPA result in instability over the long term, particularly in terms of maintenance for and management of the parks' natural resources. EQAC is excited to see progress on this front and recommends the Board continue to work with staff and the FCPA Board to seek additional means of stable, long-term funding for FCPA's natural resources maintenance activities.

Summary of Action Taken by Agency or Department

The Board of Supervisors have approved notable budget increases for natural resources each of the past two years including \$751,000 for The Landscape Legacy and Sustainability Program in FY23, one-time Third Quarter Review funds in FY23 of \$400,000 for bamboo removal on Park property and \$500,000 to better address the forest management backlog of tree-concerns on Park property, as well as FY24 funding for four additional full-time staff positions including one position to support bamboo mitigation (\$152,642) and three positions to support forestry operations (\$293,463).

Status / EQAC Comments



Over the past two years, the Board of Supervisors have provided notable increases to FCPA's funding, both in one-time and recurring funding. This is a positive step forward, but FCPA funding is still insufficient. Funding for FCPA cannot be cut without compromising service, staff, or both.

FIGURES

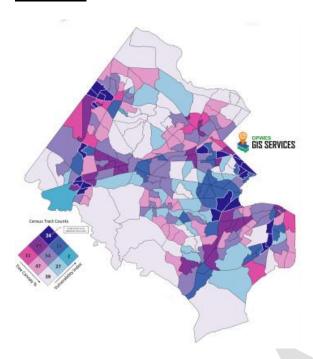


Figure V-1: Tree canopy and vulnerability index mapping areas of greatest tree canopy need.

Source: Tree canopy & vulnerability map of Fairfax County developed by DPWES staff Yeoanny Venetsanos and Juan Reyes, 2021 available as a GIS map here: https://fairfaxcountygis.maps.arcgis.com/apps/webappviewer/index.html?id=3e53aba65959421ab352f63 096273a51

Figure V-1 Alt Text (already should be on the image above). Map of Fairfax County showing the intersection of tree canopy coverage and vulnerability index which highlights census tracts of highest tree canopy need.