

R E V I S E D

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TECHNICAL REPORT

Environmental Resources

EASTERN MONTGOMERY COUNTY MASTER PLAN AREAS

Four Corners ♦ White Oak ♦ Cloverly ♦ Fairland

The Maryland-National Capital Park and Planning Commission
Montgomery County Department of Park and Planning

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Abstract

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Abstract	This report contains technical and historical background to support the environmental recommendations of the four Eastern Montgomery County master plans: Four Corners, White Oak, Cloverly, and Fairland. Each separate master plan should be consulted for the specific area environmental recommendations.

Montgomery County, stores 6.5 billion gallons. The 4,714-acre portion of the Patuxent watershed within eastern Montgomery County drains into the Rocky Gorge reservoir. The natural resources of the Patuxent River watershed include high-quality streams and wetlands, steep stream valleys and large forested areas that are partly on private land and partly protected through Washington Suburban Sanitary Commission (WSSC) land ownership. The reservoirs and their buffers are also environmentally significant in providing aquatic and terrestrial wildlife habitats.

The Patuxent watershed, particularly the upper portion, is mainly rural in character. Much of its total land cover is in agriculture or forest. However, farmland and open space throughout the watershed are rapidly being converted to low to medium density single-family residential development.

The Washington Suburban Sanitary Commission owns approximately 850 acres that provide a buffer area adjacent to the reservoir forming the northern border of eastern Montgomery County. These areas are carefully maintained for protection of the reservoirs and for recreational purposes including boating, fishing and hunting.

Wetlands

The majority of wetlands in eastern Montgomery County are upland, fresh water wetlands with varying types of vegetation (see Table 1, page 15). Most occur in narrow bands along the streams or are associated with springs, seeps, farm ponds or stormwater management ponds. The frequency, size, distribution and diversity of wetlands is far less in the more urbanized areas than in the upper or headwater sections of the watersheds.

Due to the eroding action of high storm flow velocities in urbanized areas, many of the urban streams are deeply incised and, therefore, have a low floodplain area and few adjacent wetlands. Functions of these wetlands typically include flood attenuation and nutrient/pollutant trapping. Although these wetlands do not provide exceptional wildlife habitat, they are part of stream systems that function as the only natural corridors for wildlife in the more urbanized portions of watersheds.

Wetlands identified in the suburban and rural watersheds are also typically associated with the stream valleys. However, the wetlands tend to spread out in the gentler slopes of headwater valleys and are both more frequent in distribution and larger in size than in the urban areas. Wetland functions in the less urbanized areas include groundwater recharge, baseflow maintenance, flood attenuation, nutrient/sediment trapping, food chain support, and terrestrial and aquatic wildlife habitat.

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