



MARTIN LUTHER KING JR. PARK
NATURAL COMMUNITY & RARE PLANT REPORT
May 23, 2023

OVERVIEW

Martin Luther King Jr. Park is a 22.8 acre property located at 8115 Fordson Road in Fairfax County, Virginia. Approximately 44 percent of the park is currently developed with a baseball field, swimming pool, playground, and tennis courts. The remaining undeveloped areas include upland forests, a floodplain forest, and several freshwater tidal wetland communities.

The site was surveyed by Fairfax County Park Authority (FCPA) vegetation ecologists over three separate visits during April and May 2023. Natural community occurrences were mapped and classified using the protocol detailed in the *Natural Vegetation Community Classification (NVCC) Technical Resource Manual, Version 3.5* developed by Natural Resources staff.

Community maps and associated plant data will be added to the FCPA Natural Vegetation Community Classification (NVCC) database which is available to FCPA staff.

NATURAL COMMUNITIES

Observed vegetation was mapped and classified to the level of ‘community type’ (see attached map). For each of the community types discussed below, a Community Element Global (CEGL) code is provided. These codes are unique identifiers for community types which can be searched using the United States National Vegetation Classification (<https://usnvc.org/>) or NatureServe Explorer (<https://explorer.natureserve.org/>).

The following communities were documented at Martin Luther King Jr. Park:

Coastal Plain Mixed Oak / Heath Forest (CEGL006269) – G4G5/S4

This terrestrial forest type was mapped adjacent to the developed portion of the park. The observed occurrences have an open canopy of White Oak (*Quercus alba*) and Willow Oak (*Quercus phellos*), and the disturbed understory is largely dominated by Common Greenbriar (*Smilax rotundifolia*).

Mesic Mixed Hardwood Forest (CEGL006075) - G5S5

This forest type is typically dominated by Tuliptree (*Liriodendron tulipifera*) and American Beech (*Fagus grandifolia*) in association with various Oaks (*Quercus* spp.) and Hickories (*Carya* spp.), though the latter were missing from the observed occurrence. Beech is also common in the shrub layer while patches of sedges and forbs occur in an otherwise sparse herbaceous layer.

Coastal Plain / Piedmont Small-Stream Floodplain Forest (CEGL004418) – G4/S4

This narrow and disturbed occurrence was mapped at the western extent of the park above the tidal wetlands. Tuliptree (*Liriodendron tulipifera*), Sweetgum (*Liquidambar styraciflua*), and Red Maple (*Acer rubrum*) are frequent in this forest type with Spicebush (*Lindera benzoin*) and a mix of other shrubs common in the understory. Like many other occurrences of this community type, the herbaceous layer is heavily invaded by species such as Stiltgrass (*Microstegium vimineum*) and Japanese Honeysuckle (*Lonicera japonica*).

Freshwater Tidal Hardwood Swamps (CEGL006287) – G3/S3

These forested swamps were observed as a continuous band between the uplands and the herbaceous tidal wetlands along the creek. This community was formerly dominated by Green Ash (*Fraxinus pennsylvanica*) and Pumpkin Ash (*Fraxinus profunda*) prior to the introduction of the



Figure 1. Freshwater Tidal Hardwood Swamp

Emerald Ash borer, though both species remain common as shrub-sized individuals which continue to produce seed. Common shrub species include Winterberry (*Ilex verticillata*), Southern Arrow-wood (*Viburnum recognitum*), Smooth Alder (*Alnus serrulata*), and Silky Dogwood (*Cornus amomum*). The

herbaceous layer is dense with grasses (*Glyceria striata*, *Leersia oryzoides*, *Zizania aquatica*), sedges (*Carex crinita*, *C. tribuloides*, *C. laevivaginata*) and Water-hemlock (*Cicuta maculata*).

Freshwater Tidal Shrub Swamp (CEGL006843) – GNR/SU

This shrubland often occurs as a border or ecotone between the herbaceous tidal marshes and the wooded tidal hardwood swamps. Composition can vary, but common species include Smooth Alder (*Alnus serrulata*), Black Willow (*Salix nigra*), Buttonbush (*Cephalanthus occidentalis*), Silky Dogwood (*Cornus amomum*), and Swamp Rose (*Rosa palustris*).

Tidal Freshwater Marshes

These communities are dominated by herbaceous species and occur in the uppermost reaches of the estuarine zone. While these areas are subject to diurnal flooding associated with the tides, the freshwater flowing from upstream dilutes incoming saline waters to less than 5ppt. Three types of tidal freshwater marsh were observed at Martin Luther King Jr. Park:

1. **Arrow-Arum – Pickerelweed Type (CEGL004706) - G3G4/S3S4**

This marsh type occurs at the lowest elevations onsite. While this community is typically dominated by Arrow-Arum (*Peltandra virginica*) and Pickerelweed (*Pontedaria cordata*), the occurrences at the park represent a sub-type dominated by *Nuphar advena*. This differs from CEGL004472 which occurs on lower landscape positions, experiences longer periods of inundation, and has lower plant diversity.

2. **Mixed High Marsh Type (CEGL006325) - G3/S3**

As the name implies, the mixed higher marsh occupies higher elevations and has a variable composition - often exhibiting patch dominance. Species such as Orange Jewelweed (*Impatiens capensis*), Arrow-Arum (*Peltandra virginica*), Rivershore Bulrush (*Bolboschoenus fluviatilis*), and Narrowleaf angustifolia (*Typha angustifolia*) are among the most common species in this community type.

3. **Sweetflag Type (CEGL006833) – GNR/SU**

This marsh is dominated by the introduced Sweetflag (*Acorus calamus*). While occurring at higher elevations, it tends to be inundated longer than the mixed high marsh. Other species such as Rivershore Bulrush (*Bolboschoenus fluviatilis*), Broadleaf Arrowhead (*Sagittaria latifolia*), and Dotted Smartweed (*Polygonum punctatum*) can remain frequent and often overtop the Sweetflag later in season.

Lastly, two successional or modified communities were mapped onsite:

Northeastern Modified Successional Forest – CEGL006599

This area appears to have been disturbed within the past few decades and includes a number of invasive and native, early-



Figure 2. Tidal Freshwater Marsh (Arrow-Arum - Pickerelweed Type)

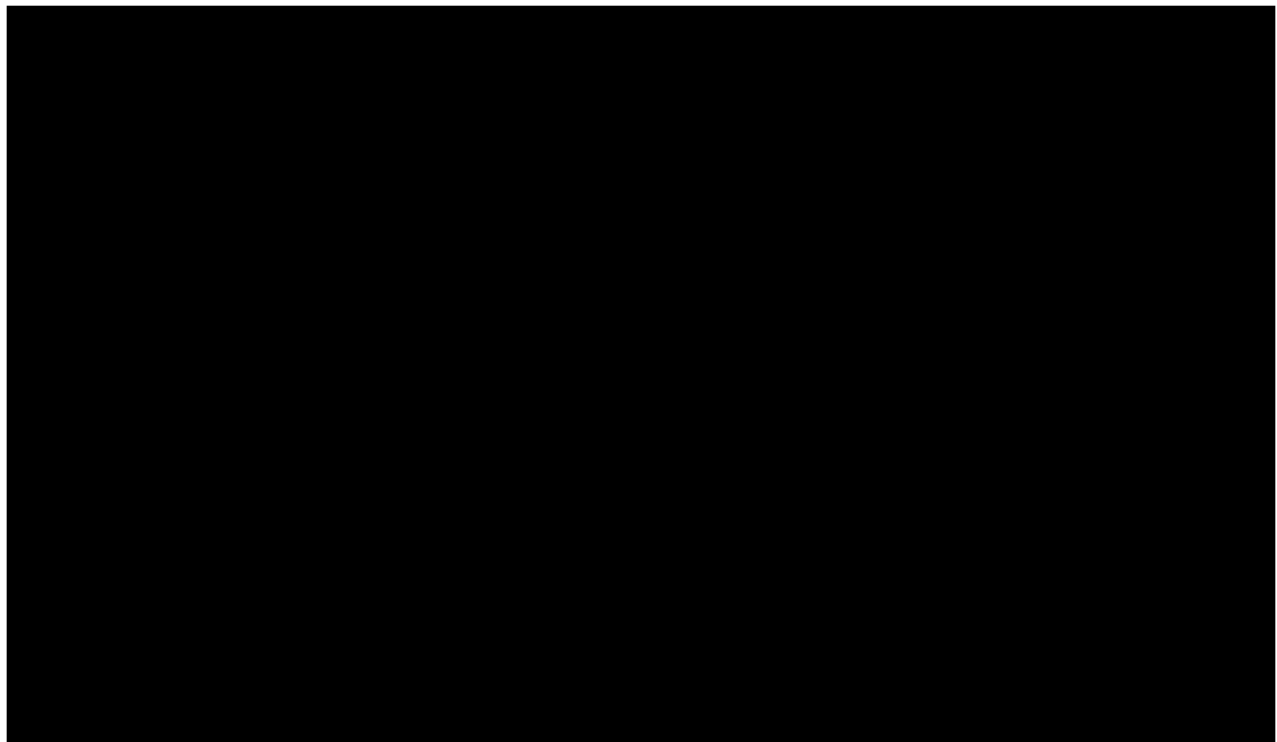
successional species in its lower strata. This area also includes a small drainage which is dominated by wetland sedges such as Atlantic Sedge (*Carex atlantica*) and Eastern Star Sedge (*Carex radiata*).

Successional Black Locust Forest – CEGLO07279

This community was mapped as a narrow, disturbed strip at the eastern extent of the park. This area is dominated by Black Locust (*Robinia pseudoacacia*) and has mix of both native and introduced components in the shrub and herbaceous layer.

RARE PLANTS

Targeted surveys for rare plants were not conducted at Martin Luther King Jr. Park, however, two rare species were encountered while mapping tidal wetland communities at the site:



Targeted surveys for rare species may yield additional records. The following taxa have been documented in regional tidal wetlands and may occur at Martin Luther King Jr. Park:

- **Sensitive Joint-Vetch (*Aeschynomene virginica*) – G2/S2**
This Federally Threatened annual species occurs in tidal marshes and has extant populations in nearby Washington D.C. and Stafford County, Virginia. This species is best detected during its blooming season which is reported to last from July through October.
- **Cypress-knee Sedge (*Carex decomposita*) – (G3G4/S1)**
This species has been documented in tidal swamps and marshes where it often occurs at the base of trees or on fallen logs. Recommended survey period May – July.
- **Buttonbush Dodder (*Cuscuta cephalanthi*) – (G5/S1)**

This species may be found on *Cephalanthus occidentalis* or on other shrubs or herbaceous species. Recommended survey period August – September.

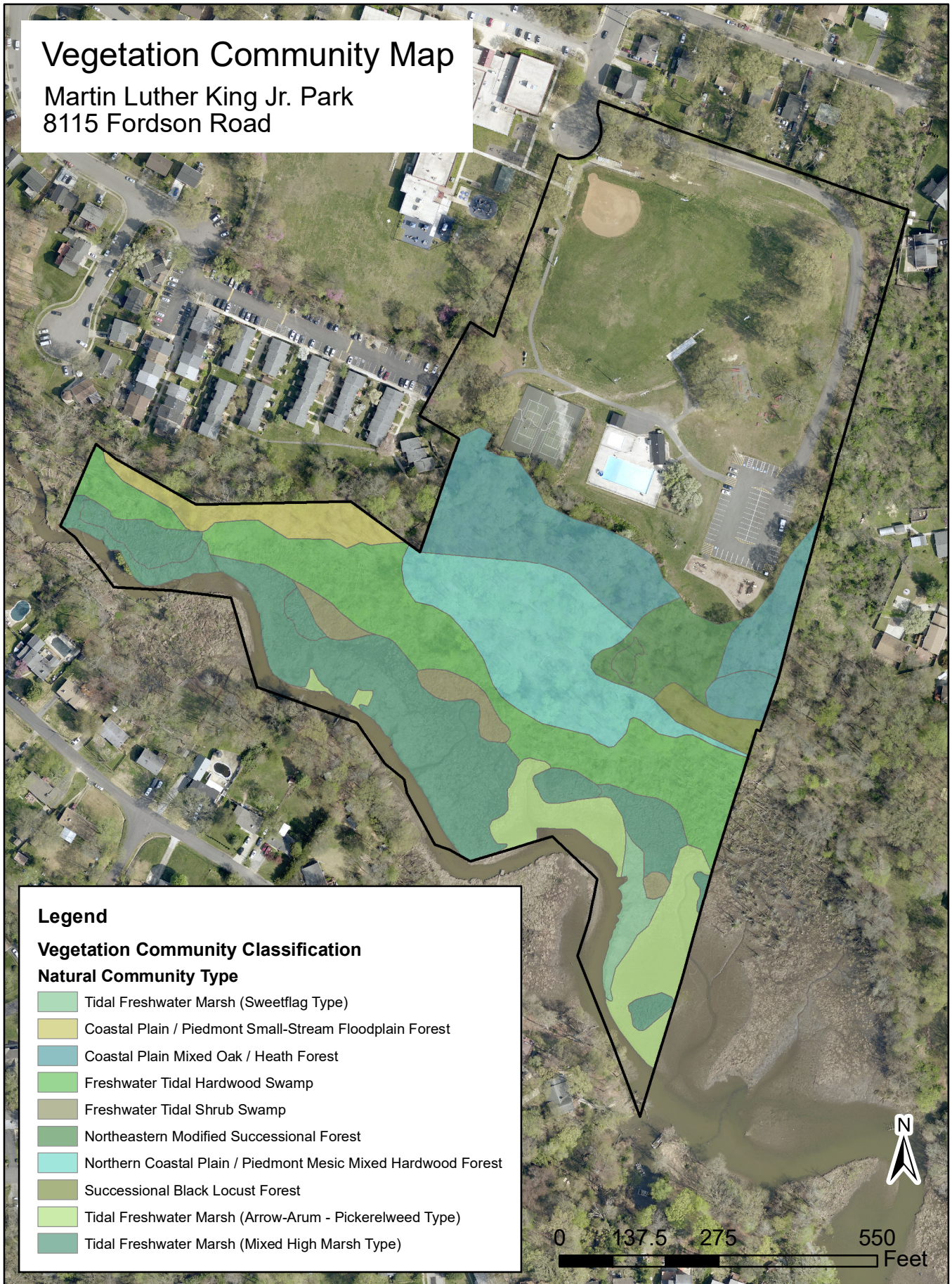
- **Parker's Pipewort (*Eriocaulon parkeri*)** – (G3/S2)
On intertidal shores and exposed substrates of tidal wetlands. Recommended survey period July – October.
- **King-root (*Plantago cordata*)** – (G4/SH)
Known from tidal swamps along the Potomac. Recommended survey period May – June.
- **Water-plantain Crowfoot (*Ranunculus ambigens*)** – (G4/S1)
Known from a variety of wetland community types, including freshwater tidal wetlands. Recommended survey period April – June.
- **Nuttall's Micranthemum (*Micranthemum micranthemoides*)** – (GH/SH)
This species previously documented in Fairfax County may now be globally extinct. Nuttall's *Micranthemum* has not been observed in several decades. Historic records indicate the species could be found on sandy, gravelly, or muddy, freshwater intertidal shores. Recommended survey period August – October (during low tide).
- **Hard-stem Bulrush (*Schoenoplectus acutus*)** – (G5T5/S1)
This species has previously been documented along freshwater tidal marshes in Arlington, Fairfax, and Prince William counties. Recommended survey period June – August.

Surveys for the species listed above should be conducted during the appropriate periods to increase the likelihood of detection.

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Vegetation Community Map









Martin Luther King Jr. Park
8115 Fordson Road



Legend

Vegetation Community Classification

Natural Community Type

-  Tidal Freshwater Marsh (Sweetflag Type)
-  Coastal Plain / Piedmont Small-Stream Floodplain Forest
-  Coastal Plain Mixed Oak / Heath Forest
-  Freshwater Tidal Hardwood Swamp
-  Freshwater Tidal Shrub Swamp
-  Northeastern Modified Successional Forest
-  Northern Coastal Plain / Piedmont Mesic Mixed Hardwood Forest
-  Successional Black Locust Forest
-  Tidal Freshwater Marsh (Arrow-Arum - Pickerelweed Type)
-  Tidal Freshwater Marsh (Mixed High Marsh Type)

