

Appendix E



Meghan Powell/USFWS

Fall foliage on the Powell Creek nature trail

Wilderness Review

Wilderness Review for James River National Wildlife Refuge

This appendix summarizes the wilderness review for the 4,324-acre James River National Wildlife Refuge (NWR, refuge) located in Prince George County, Virginia (map E-1). The purpose of a wilderness review is to identify and recommend to Congress the lands and waters of the National Wildlife Refuge System (Refuge System) that merit inclusion into the National Wilderness Preservation System. Wilderness reviews are a required element of comprehensive conservation plans (CCPs); are conducted in accordance with the refuge planning process outlined in the U.S. Fish and Wildlife Service (Service) Manual (602 FW 1 and 3), including interagency, public, and Tribal involvement; and include compliance with the National Environmental Policy Act (NEPA).

There are three phases to the wilderness review process: inventory, study, and recommendation. In the inventory phase, we identify lands and waters that meet the minimum criteria (described below) for wilderness. Areas meeting these criteria are called wilderness study areas (WSAs). In the study phase, we evaluate WSAs to determine if they are suitable for wilderness designation, including an assessment of whether the WSA can be effectively managed as wilderness. In the recommendation phase, we use the findings of the study to determine if we will recommend a WSA for wilderness in the final CCP. We forward a wilderness study report with recommendations on wilderness designation from the Director of the Service, through the Secretary of the Interior and the President, to Congress. Congress has the authority to make final decisions on wilderness designation. We prepare that report after our Regional Director has satisfied NEPA requirements by signing the record of decision for the final environmental impact statement and approved the final CCP.

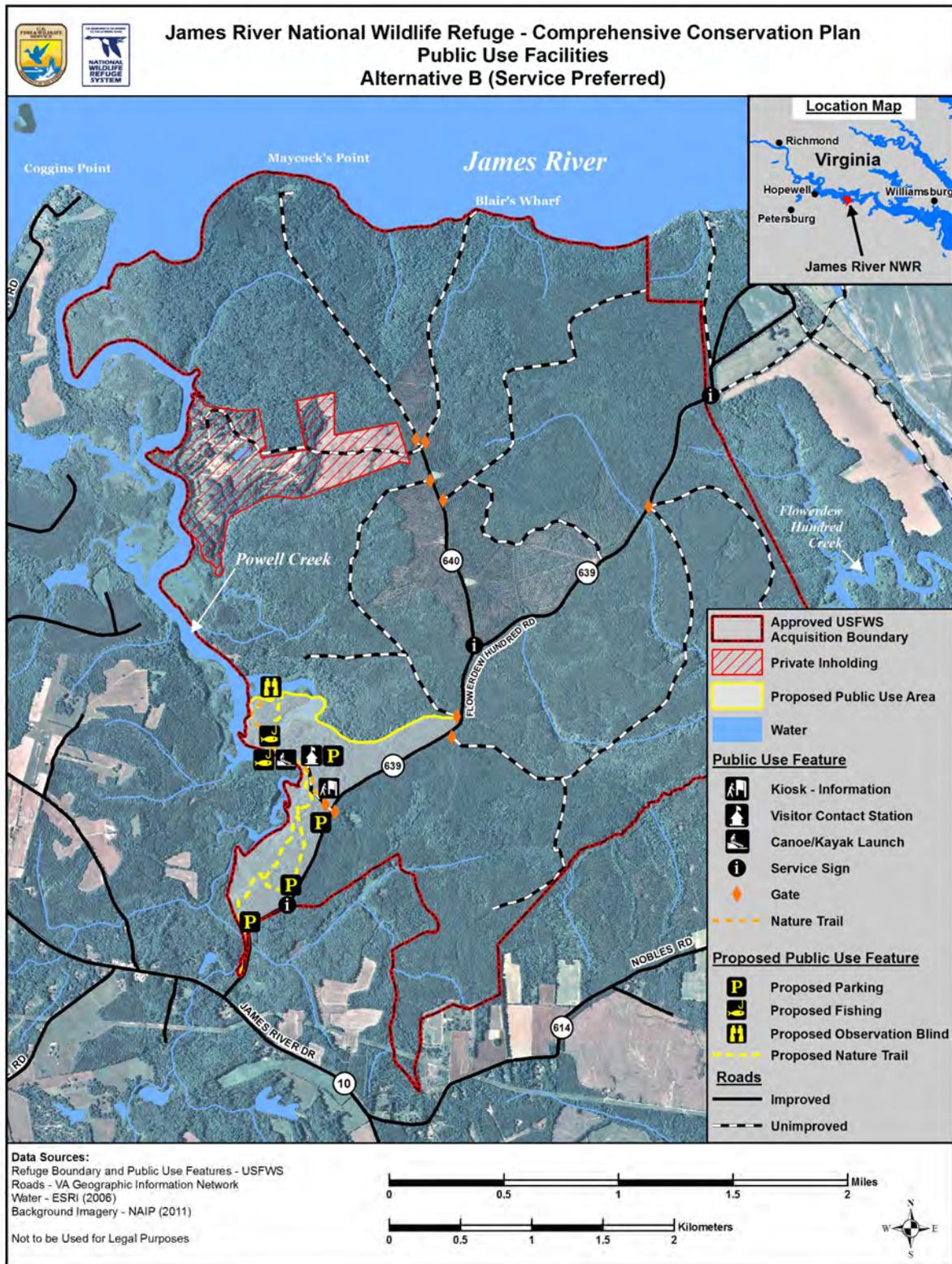
We manage any areas recommended for designation to maintain their wilderness character in accordance with the management goals, objectives, and strategies outlined in the final CCP, until Congress makes a decision or we amend the CCP to modify or remove the wilderness proposal. If the inventory does not identify any areas that meet the WSA criteria, we document our findings in the administrative record for the CCP and end the study process. We manage nonwilderness areas following the management direction outlined in the CCP.

During the inventory phase for James River NWR, we determined that the minimum criteria for wilderness were not met; therefore, we did not proceed with the study or recommendation phases. The results of the inventory are presented below.

Wilderness Inventory

The wilderness inventory is a broad look at refuge lands to identify WSAs. Only those refuge lands owned in fee title are considered. WSAs must meet the minimum criteria for wilderness identified in section 2(c) of the Wilderness Act, which are size, naturalness, and opportunities for solitude or primitive recreation. Other supplemental values are evaluated but not required. Our evaluation of the extent to which refuge lands meet the minimum wilderness criteria is discussed below.

Map E-1 Alternative B: Proposed Public Use Facilities



Evaluation of the Size Criteria

To evaluate the size criteria, we review every roadless area of 5,000 contiguous acres or more, and every roadless island. “Roadless” refers to the absence of improved roads suitable and maintained for public travel by means of motorized vehicles primarily intended for highway use.

The Service has interpreted the size criteria for wilderness to be satisfied under the following situations:

- An area with more than 5,000 contiguous acres. State and private lands are not included in making this acreage determination.
- A roadless island of any size. A roadless island is defined as an area surrounded by permanent waters or that is markedly distinguished from the surrounding lands by topographical or ecological features. We interpret a “road” to be something that is improved and maintained for legal street vehicles and for public travel.
- An area of less than 5,000 contiguous Federal acres that is of sufficient size as to make practicable its preservation and use in an unimpaired condition, and of a size suitable for wilderness management.
- An area of less than 5,000 contiguous Federal acres that is contiguous with a designated wilderness, recommended wilderness, or area under wilderness review by another Federal wilderness managing agency such as the Forest Service, National Park Service, or Bureau of Land Management.

We have determined that James River NWR does not meet the size criteria because the 4,324-acre refuge is not roadless and it is not practicable to preserve or use the roadless portions of the refuge in an unimpaired condition. Four miles of paved road are State-owned and maintained for vehicular access by the public to access adjacent private properties. Thirteen miles of unimproved roads were established prior to refuge establishment to support timber harvest operations, and these roads continue to be used by the Service and authorized persons in support of refuge operations (e.g., commercial harvesting and prescribed burning activities in the refuge’s pine forest).

Evaluation of Naturalness Criteria

The Wilderness Act section 2(c) defines wilderness as an area that “... generally appears to have been affected primarily by the forces of nature with the imprint of man’s work substantially unnoticeable” The area must appear natural to the average visitor rather than “pristine.” The presence of historic landscape conditions is not required.

An area may include some human impacts provided they are substantially unnoticeable in the unit as a whole. Significant human-caused hazards, such as the physical impacts of refuge management facilities and activities, are also considered in evaluation of the naturalness criteria. An area may not be considered unnatural in appearance solely based on the “sights and sounds” of human impacts and activities outside the boundary of the unit. We considered the cumulative effects of these factors in conjunction with refuge size and physiographic and vegetative characteristics in the evaluation of naturalness.

We have determined that James River NWR does not meet the naturalness criteria for several reasons. Throughout the 4,324-acre refuge, evidence of historic and current human occupation, alteration, and management is noticeable and obvious to refuge visitors.

There are numerous facilities on the refuge (most are noted on map E-1), including:

- A 0.88-acre maintenance complex on the refuge with a cluster of structures and support facilities,

which includes: an equipment shed (400-square foot tin-sided enclosure with 800-square foot roofed, open-walled shed area); a one-story cinderblock building (800 square feet) used as an ADA-accessible hunter check station; a 100-foot high repeater radio tower used during prescribed burning on the refuge; and electricity transmission poles.

- A 0.3-acre fenced area with remote automatic weather station.
- Five unoccupied buildings.
- Four known cemeteries or burial sites.
- Remnants of a skeet range on a 25-acre site.
- Remnants of a 215-foot long pier and associated construction debris on the shoreline.

Public access to, and use of, the refuge occurs via:

- 3.6 miles of paved State road (Route 639), of which 3.26 miles are within the refuge.
- 0.94 miles of well-maintained, gravel State road (Route 640).
- 12.28 miles of unimproved, gravel and dirt refuge roads.
- One unimproved soft launch for canoes and kayaks.
- A culvert and an earthen levee that straddle a feeder to Flowerdew Creek on Hunter Circle Road.

Although Service policy stipulates that offsite impacts cannot be the sole reason to eliminate an area from further consideration, they can be a factor. At James River NWR, significant offsite impacts include the regular use and maintenance of the adjacent James River shipping channel used by large barges and container shipping traffic. Large ships or barges are visible and can be heard from along 3 miles of river shoreline within the refuge (map E-1). This 3-mile long stretch of the James River is also a popular route for large recreational motor boats, personal watercraft, and use for various water sports. Recreational boat traffic is very heavy during favorable weather conditions during the spring, summer, and fall seasons. Since the James River is 1-mile wide adjacent to the refuge, motorized boat traffic adjacent to the refuge's shoreline has a greater impact on the natural soundscape.

Evaluation of Outstanding Opportunities for Solitude or Primitive and Unconfined Recreation

A WSA must provide outstanding opportunities for solitude or primitive and unconfined recreation. However, the area does not have to possess outstanding opportunities for both elements, and does not need to have outstanding opportunities on every acre. Furthermore, an area does not have to be open to public use and access to qualify under this criteria; Congress has designated a number of wilderness areas in the Refuge System that are closed to public access to protect resource values.

Opportunities for solitude refer to the ability of a visitor to be alone and secluded from other visitors in the area. Primitive and unconfined recreation means non-motorized, dispersed outdoor recreation activities that are compatible and do not require developed facilities or mechanical transport. These primitive recreation activities may provide opportunities to experience challenge and risk, self-reliance, and adventure.

These two opportunity “elements” are not well defined by the Wilderness Act, but in most cases, can be

expected to occur together. However, an outstanding opportunity for solitude may be present in an area offering only limited primitive recreation potential. Conversely, an area may be so attractive for recreation use that experiencing solitude is not an option. We considered these factors and their cumulative effects when evaluating the availability of outstanding opportunities for solitude or primitive recreation:

We have determined that James River NWR meets the criteria for providing solitude, as well as primitive and unconfined recreation. Refuge visitors can be alone and secluded from other visitors in the area in some areas of the refuge and experience primitive and unconfined recreation outside of the active refuge management seasons (spring and fall). Primitive and unconfined public deer hunting occurs in the fall on approximately 4,000 of the refuge's 4,324 acres. Primitive and unconfined wildlife observation, nature photography, environmental education, and interpretation opportunities are offered on 100 of the refuge's 4,324 acres. Timber harvesting and prescribed burning activities occur sporadically throughout the spring and fall months annually. A limited public deer hunt is offered annually on the refuge between early October and early December. A visitor can feel alone and secluded in areas where vegetation screens view of refuge operational equipment, public roads, adjacent residential developments, and agricultural areas.

Evaluation of Supplemental Values

The Wilderness Act states that a wilderness area may contain ecological, geological, or other features of scientific, educational, scenic, or historical value. These values are optional but the degree to which their presence enhances the area's suitability for wilderness designation should be considered.

James River NWR has several supplemental values related to the presence of ecological, scientific, educational, scenic, and historical value. All of these values are described in detail in chapter 2 of the draft CCP/EA. In brief, the refuge has:

- Ecological value as protected riparian habitat, carbon sequestration, nursery for native wildlife and plants. The refuge is included within the 118,218-acre Lower James Important Bird Area, as well as State-designated bald eagle summer and winter concentration areas, and State-designated anadromous fish use area.
- Scientific value as a site for amphibian and reptile health assessments and Lyme disease inhibition research.
- Educational value as one of two refuges within 25 miles of the Richmond metropolitan area and its 1.28 million people, as a bald eagle sanctuary, site to communicate about endangered species recovery efforts, and as a forest management demonstration area.
- Scenic value from the land and waters of Powell Creek and the James River as representative of an indigenous cultural landscape.
- Historical value as evidenced by historic records, maps, and artifacts from as early as the Early Archaic period (8000-6500 B.C.) through the early 20th century. Evidence of human occupation includes American Indians, early European and African-American settlements, and military actions during the Revolutionary War, War of 1812, and Civil War.

Summary of Wilderness Inventory Findings

Our inventory concludes that James River NWR does not meet the minimum criteria for a WSA and will not be recommended for further evaluation of wilderness potential. While there are recreational and supplemental values on the refuge, these do not, in and of themselves, warrant wilderness recommendation. We will reevaluate this determination in 15 years with the revision of this CCP or sooner if significant new information warrants a reevaluation.