National Park Service
Cultural Landscapes Inventory

2002

Revised: 2/2024



Walnut Hill

Valley Forge National Historical Park

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Introduction

The Cultural Landscape Inventory (CLI)

The Cultural Landscape Inventory (CLI) is a comprehensive inventory of all cultural landscapes in the National Park System. Landscapes that are listed, or eligible for listing, on the National Register of Historic Places, or are otherwise managed as cultural resources and in which the National Park Service has, or plans to acquire, legal interest are included in the inventory. The CLI identifies and documents each landscape's location, size, physical development, landscape characteristics, character-defining features, and condition. Cultural landscapes have approved CLIs when concurrence with the findings is obtained from the park superintendent and all required data fields are entered into the Cultural Resources Information System (CRIS-CL) database. In addition, for landscapes not currently listed on the National Register and/or without adequate documentation, concurrence is required from the State Historic Preservation Officer, Tribal Historic Preservation Officer, or the Keeper of the National Register.

Scope of the CLI

The information contained within the CLI is compiled from primary and secondary sources and through on-site surveys of the landscape. The level of investigation is dependent upon scoping the need for information. The baseline information collected provides a comprehensive look at the historical development and significance of the landscape. Documentation and analysis of the existing landscape identifies character-defining characteristics and features and allows for an evaluation of the landscape's integrity and an assessment of the landscape's condition. The CLI also includes historic maps, drawings, and images; photographs of existing conditions; and a site plan that indicates major features. The CLI documents the existing condition of park landscape resources and identifies impacts, threats, and measures to stabilize condition. This information can be used to develop strategies for improved stewardship. Unlike a Cultural Landscape Report (CLR), the CLI does not provide management recommendations or treatment guidelines for the cultural landscape, but it may identify stabilization measures.

The Cultural Resources Information System (CRIS)

CRIS is the National Park Service's database of cultural resources on its lands, consisting of archeological sites, historic structures, ethnographic resources, and cultural landscapes. Cultural Resources Inventory System (CRIS) replaces three legacy inventory systems: ASMIS (archeology), CLI (cultural landscapes), and LCS (historic structures); and it reinstates the former ERI (ethnographic resources). This Cultural Landscape Inventory document reflects the information in a corresponding CRIS Cultural Landscape record.

Statutory and Regulatory Foundation

The legislative, regulatory, and policy directives for conducting and maintaining the CLI within CRIS are:

- National Historic Preservation Act (NHPA) of 1966 (16 USC 470h-2(a)(1)) Sec. 110
- Executive Order 13287: Preserve America, 2003. Sec. 3 (a and c)
- Secretary of the Interior's Standards and Guidelines for Federal Agency Historic Preservation Programs
- Pursuant to the National Historic Preservation Act, 1998. Std. 2
- Cultural Resource Management Guideline, 1997, Release No. 5, page 22; issued pursuant to Director's Order #28 (DO-28)

The NHPA requires the identification, evaluation, and nomination of historic properties to the National Register of Historic Places and the maintenance and expansion of an inventory of cultural resources. DO-28 requires a cyclic assessment of the current condition of cultural landscapes based on an assessment interval, with a default of six years.

Use

Beyond fulfilling legal and policy requirements, park staff can use the Cultural Landscape Inventory in the following ways:

- To learn about park cultural landscapes (all staff)
- To inform management decisions (park managers)
- To inform project planning and development (park managers, facility managers, project managers, compliance specialists)
- To monitor the condition of the cultural landscape and take measures to protect its significance and integrity (cultural resource managers, facility managers)
- To recognize the stabilization and treatment needs of landscape features and plan work within cultural landscapes to address the needs (facility managers, cultural resource managers)
- To understand the cultural value of natural systems in a cultural landscape (natural resource managers)
- To create programming and educational materials based on site history (interpretation and education specialists)
- To recognize impacts within cultural landscapes and enforce protection measures (visitor and resources protection staff)

General Information

Property Level and CLI Numbers

Inventory Unit Name: Walnut Hill

Resource Classification: Component Landscape

CLI Identification Number: 300021

Parent Landscape: 300015

Inventory Status: Complete

Park Information

Park Name: Valley Forge National Historical Park

Alpha Code: VAFO

Park Organization Code: 4860

Park District: VAFO

Region: Northeast

Restricted: Yes

Landscape Description:

Walnut Hill is part of Valley Forge National Historical Park (NHP), which preserves and commemorates the site of the 1777–1778 winter encampment of the main body of the Continental Army under the command of General George Washington. The park is located in southeastern Pennsylvania, approximately 20 miles northwest of Philadelphia. It straddles the Schuylkill River and contains land in two counties (Chester and Montgomery) and five municipalities (Lower Providence, Schuylkill, Tredyffrin, Upper Merion, and West Norriton). Originally established as Pennsylvania's first state park in 1893, the park has been managed by the National Park Service since 1976 and now encompasses approximately 3,452 acres.

The land to the north of the Schuylkill River is generally referred to as the North Side and that to the south, as the South Side. Seventy-five percent of the park lies on the South Side, which is composed of three distinct landforms: the dolomite limestone valley, quartzite hills, and red sandstone and shale river terraces. The twin peaks known as Mounts Joy and Misery visually and physically anchor the west-central portion of the South Side. These two prominent landforms were important defensive elements of the Revolutionary War encampment, providing opportunities for long views across open areas and presenting challenging terrain to intruders. The North Side covers much of the southern half of the Perkiomen Peninsula formed by the confluence of Perkiomen Creek with the Schuylkill River, and its landform is characterized by a series of fertile river terraces formed on red sandstone and shale. The pastoral landscape of this area, with open fields surrounded by forest, encompasses several former multi-generational farms.

The 471-acre Walnut Hill area occupies the southwestern portion of the Perkiomen Peninsula, formed by the Schuylkill River and Perkiomen Creek. The majority of the component landscape is rural and agricultural in character. Gently rolling terrain of an upper riverine terrace characterizes the central portion of the site, and more steeply sloped escarpments edge the upland, falling away toward the river floodplain below. Visible evidence of nineteenth-century farmsteads dominate the upland knolls, while remnant features associated with transportation and conservation can be identified along the river margins. Extant features as well as known archeological resources indicate a long history of cultural use and occupation, likely dating from the Late/Transitional Archaic to Early Woodland periods. There are also late twentieth-century features associated with park development.

Walnut Hill is thought to have had strong ties to the Revolutionary War-era encampment of the Continental Army across the river. However, available documentation does not always support traditional interpretations of the role of the property in the encampment. It is probable that the Walnut Hill landscape was utilized to some degree by the cantonment—guards likely were posted on the property; existing buildings may have been utilized for military or commissary officer housing, storage, and/or administrative functions; agricultural stores likely were appropriated for the troops, the Pawling family mill likely ground grains for flour; timber likely was harvested for fuel and construction materials; and a bridge connection—referred to as Sullivan's Bridge—was constructed across the Schuylkill between the primary encampment area and the Pawling property to facilitate river crossings. During the encampment, soldiers are known to have visited the property in order to escape life in the camp and to search for food. After the construction of Sullivan's Bridge, a market was established near the terminus on the Pawling property where soldiers were able to buy food and other materials made available by local farmers and merchants. Many of the features thought to have existed at the time are no longer extant.

The existing landscape reflects past agricultural uses spanning more than two hundred and fifty years of settlement and cultivation by European immigrants, and their descendants, enslaved people, and tenant laborers. Two dwelling complexes are at least partially extant at Walnut Hill. These exhibit a layering of architectural and organizational patterns representative of eighteenth, nineteenth, and twentieth century tastes and practices, and are supported by broad expanses of fields, hedgerows, farm lanes, fencing, and outbuildings associated with the site's agricultural use over time. One such extant structure is an enormous stone barn. Other landscape features extant on the property are associated with eighteenth and nineteenth century transportation corridors and twentieth century industrial endeavors. These remnant features include a towpath, stone retaining walls, a lock and dam, and other stone abutments that appear to have been associated with early to middle nineteenth century canal use of the Schuylkill River; an abandoned rail line now in use as a trail; and large impoundment basins constructed in support of river-bottom dredging in the middle twentieth century to remove coal culm deposits and improve water quality.

State and Federal Park development and management of the property have added another layer of landscape history to the area. On the Walnut Hill property, these contemporary interventions are limited to trails, access roads, and parking, and the erection of protective fencing around potentially hazardous sites. While some former fields have been allowed to revert to woodlands during the twentieth century, much of the landscape continues to be maintained in open cover to perpetuate the former agricultural spatial character of the property.

SIGNIFICANCE SUMMARY

Valley Forge NHP, including a portion Walnut Hill, was designated as a National Historic Landmark in 1961 when it was known as Valley Forge State Park. As a component landscape of Valley Forge NHP, the Walnut Hill is significant under National Register of Historic Places Criteria A, C, and D at national and local levels.

Walnut Hill is primarily significant at the national level in the area of Military History as the location of the Continental Army's encampment during the winter of 1777–1778, which ranks among the most famous events of the Revolutionary War. The property has additional national-level significance in the area of Conservation for its contributions to the history of historic preservation and in the area of Commemoration for its commemorative feature on the park landscape. Walnut Hill possesses local-level significance in the area of Agriculture for the establishment of and improvements to farmsteads that typify the agricultural development of the region, and in the area of Architecture for the Pennsylvania Barn style of the stone 1826–1845 estate barn and for the nineteenth and early-twentieth century building styles of the tenant house, privy and storage building, and the estate spring house. Lastly, the property possesses local-level significance in the area of Prehistoric Archeology for its realized and potential ability to contribute substantive data regarding the Pre-Contact Period occupation of Valley Forge (8000 BCE–1600 CE).

The Walnut Hill component landscape shares the same period of significance as the larger Valley Forge NHP: 8000 BCE–1600 CE and ca.1710–1949. The former period encompasses the Early Archaic through Late Woodland periods during which the property, as evidenced by the presence of significant archeological sites, was occupied by Native Americans. The latter period includes the years when property achieved its primary national significance as the site of the Continental Army's encampment during the winter and spring of 1777–1778. The years between ca.1710 and 1777–1778 and through the late nineteenth century, represent locally significant periods of agricultural and industrial development of Valley Forge and include the construction dates for a number of architecturally significant resources, as well as the overlapping period between 1876 and 1949 during which the nationally significant events associated with the conservation and commemoration of the Valley Forge encampment site occurred. The 1949 end date of significance corresponds to the year that the restoration-focused development program laid out by the Valley Forge

Park Commission in 1936 and overseen by preservation architect George Edwin Brumbaugh was completed.

ANALYSIS AND EVALUATION SUMMARY AND CONDITION

The Walnut Hill landscape is primarily characteristic of its nineteenth century development as a prosperous family farm or plantation. Landscape features such as field patterns, circulation routes, building clusters, views and viewsheds, and adaptations to water resources survive from the nineteenth century, and depict the agricultural character of a prominent farmstead. While it is likely that surviving nineteenth century agricultural patterns are rooted in those established by the Pawling family in the eighteenth century, very little is known about the character of the Walnut Hill landscape prior to or during the Revolutionary War-era encampment. As such, the property's integrity for the eighteenth-century encampment-era period has been heavily diminished by the many changes that have occurred over the ensuing two hundred years.

For the nineteenth century agricultural period of significance, the component landscape retains integrity of location, feeling, and association, and, to a lesser degree, integrity of setting, design, materials, and workmanship. Certain large-scale construction projects, such as the development of the Pennsylvania and Schuylkill Valley Railroad line and US Route 422, are thought to have led to site-specific losses of potentially important prehistoric and historic resources. Nonetheless, the component landscape contributes to the park's overall integrity even though it has undergone considerable changes during the period of significance and since its end. Those landscape characteristics and features that do remain from the historic period retain integrity and should be preserved.

Various features also survive on the property that relate to important nineteenth century regional transportation developments, and to mid-twentieth century conservation efforts that have historic significance. Nineteenth century canal, road, and rail line developments retain a minimal degree of integrity; alignments and a few resources survive, but much of the historic fabric of these systems has been lost. The property also contains other landscape features that are wholly unrelated to the farm's agricultural activities, namely large siltation basins dating to the mid-twentieth century that were once used to extract coal silt from the riverbed.

Condition:
The Walnut Hill component landscape is in fair condition. Buildings have all been stabilized, but the area lacks a cohesive interpretive identity. The recently constructed Sullivan's Bridge connects the north and south sides of the park for pedestrian and bicycle access for the first time since the demolition of the Betzwood Bridge in 1995, presenting an opportunity to integrate Walnut Hill and the neighboring Betzwood and Fatland areas into the broader Valley Forge NHP landscape. The adverse impacts from adjacent lands caused by the private property subdivision of the Meadow Grove and the Pawling farmstead have been resolved by the 78-acre land transfer with the American Revolution Center (ARC) completed in 2009, and the entirety of these properties is under the administration of the National Park Service. The archeological sites located in these areas are now complete and have been stabilized. Initial seeding of the transferred land area introduced invasive plant species, but maintenance has restored healthy native meadows to the area and invasive species are no longer considered to be a significant threat. However, invasive plants are present in some fields that have reverted to successional forests.

Landscape Hierarchy Description:

To support CLI documentation, the CLI Professional Procedures Guide has established a hierarchy of landscapes and component landscapes. A landscape is a site or district that is listed on or eligible for listing on the National Register of Historic Places, and includes landscape characteristics and features that define the historic character of the cultural landscape. Complex landscapes can be subdivided into distinct component landscape areas that contribute to the significance of the landscape, and may also be individually listed on or eligible for the National Register. Component landscapes warrant individual documentation to adequately record the physical character or assemblage of related features. Examples of component landscapes include a campground, farmstead, garden, cemetery, or road system.

One overall landscape and five component landscapes have been identified for Valley Forge National Historical Park. The overall Valley Forge NHP Landscape is coterminous with the park boundary and includes all natural and cultural features related to the encampment, agriculture, industrial, commemoration, and recreation uses that are contributing to the National Register. Due to the large and complex nature of the NHP Landscape, analysis and evaluation of these resources are addressed in five component landscapes: Other Encampment Areas, Port Kennedy, Valley Forge Farms, Village of Valley Forge, and Walnut Hill.

Landscape Type:

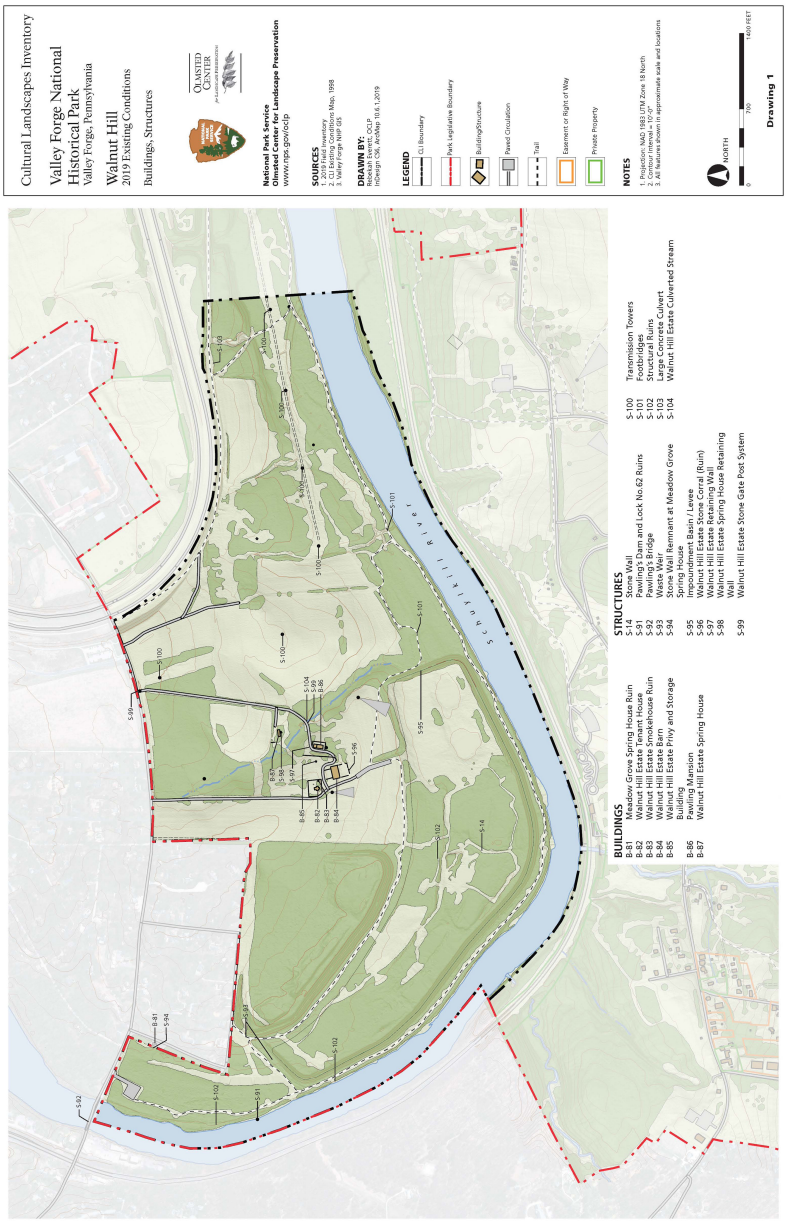
Historic Site

Historic Vernacular Landscape

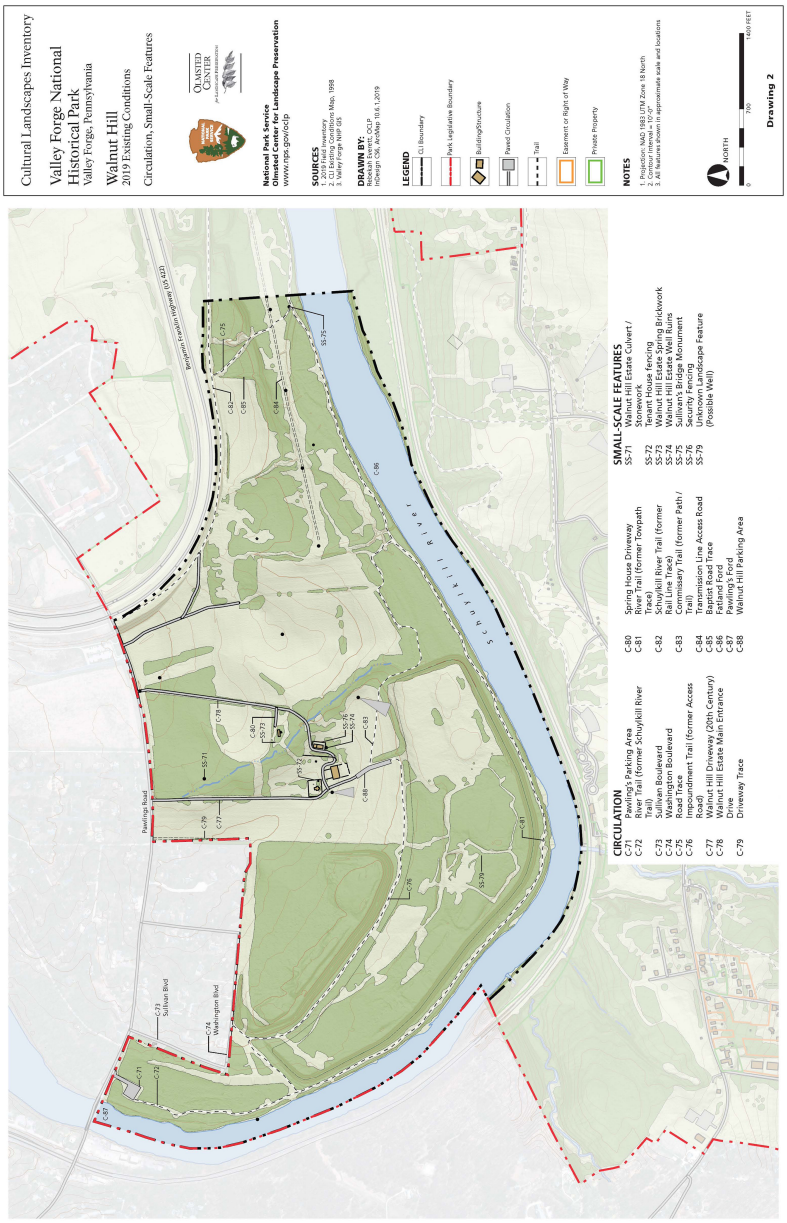
Other Names:

Other Name:	Meadow Grove	**Other Name Type:**	Both Current And Historic
Other Name:	Pawling's Farm	**Other Name Type:**	Historic
Other Name:	Valley Forge	**Other Name Type:**	Current
Other Name:	Valley Forge National Historical Park	**Other Name Type:**	Current
Other Name:	Valley Forge State Park	**Other Name Type:**	Historic
Other Name:	Walnut Hill Estate	**Other Name Type:**	Both Current And Historic
Other Name:	Wetherill Barn and Tenant House	**Other Name Type:**	Historic

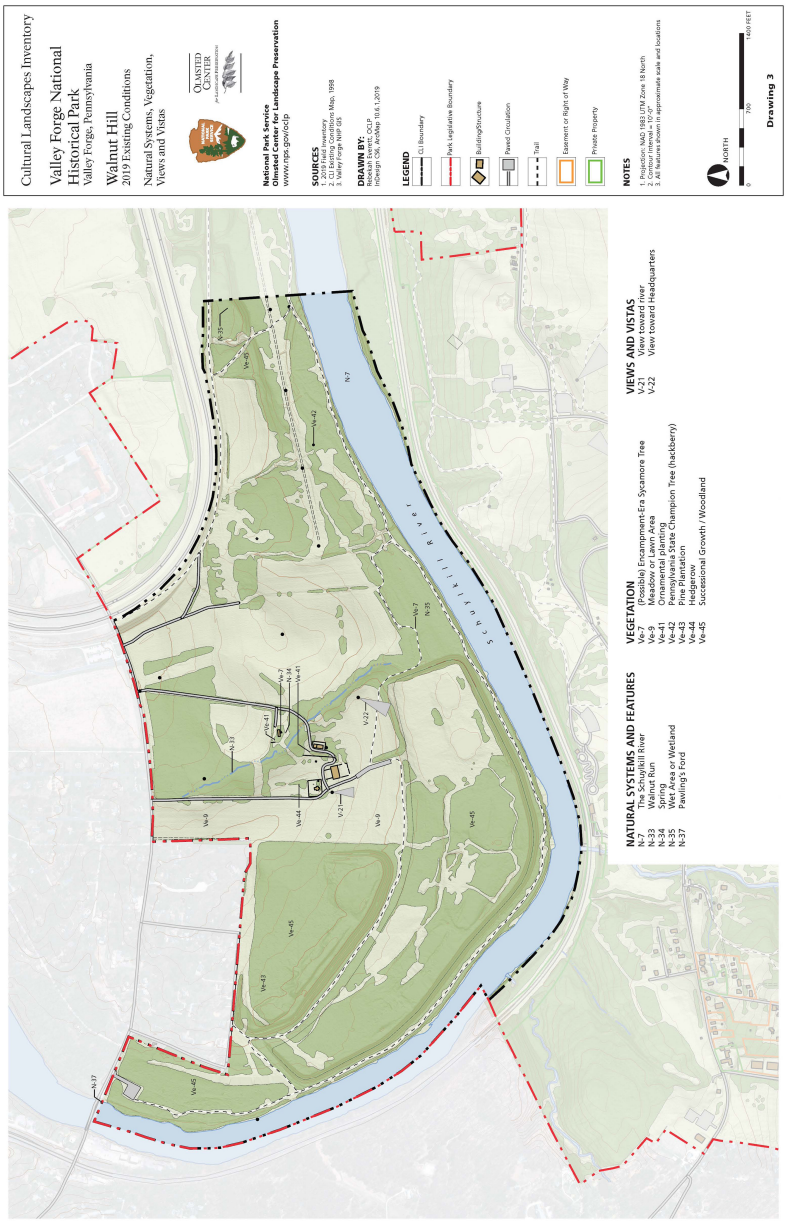
Site Plan



Site map, 2024, Drawing 1 of 3.

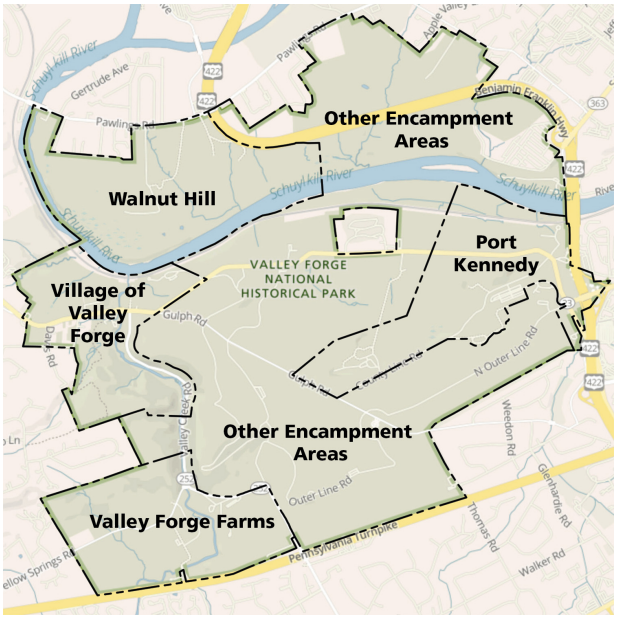


Site map, 2024, Drawing 2 of 3.



Site map, 2024, Drawing 3 of 3.

Hierarchy Description Graphic:



Map showing the five landscapes at Valley Forge National Historical Park--hereafter NHP. (Olmsted Center for Landscape Preservation--hereafter OCLP--2022)

Concurrence Information

Concurrence Status:

Park Superintendent Concurrence: Yes

Park Superintendent Date of Concurrence: 09/05/2002

Completion Status Explanatory Narrative:

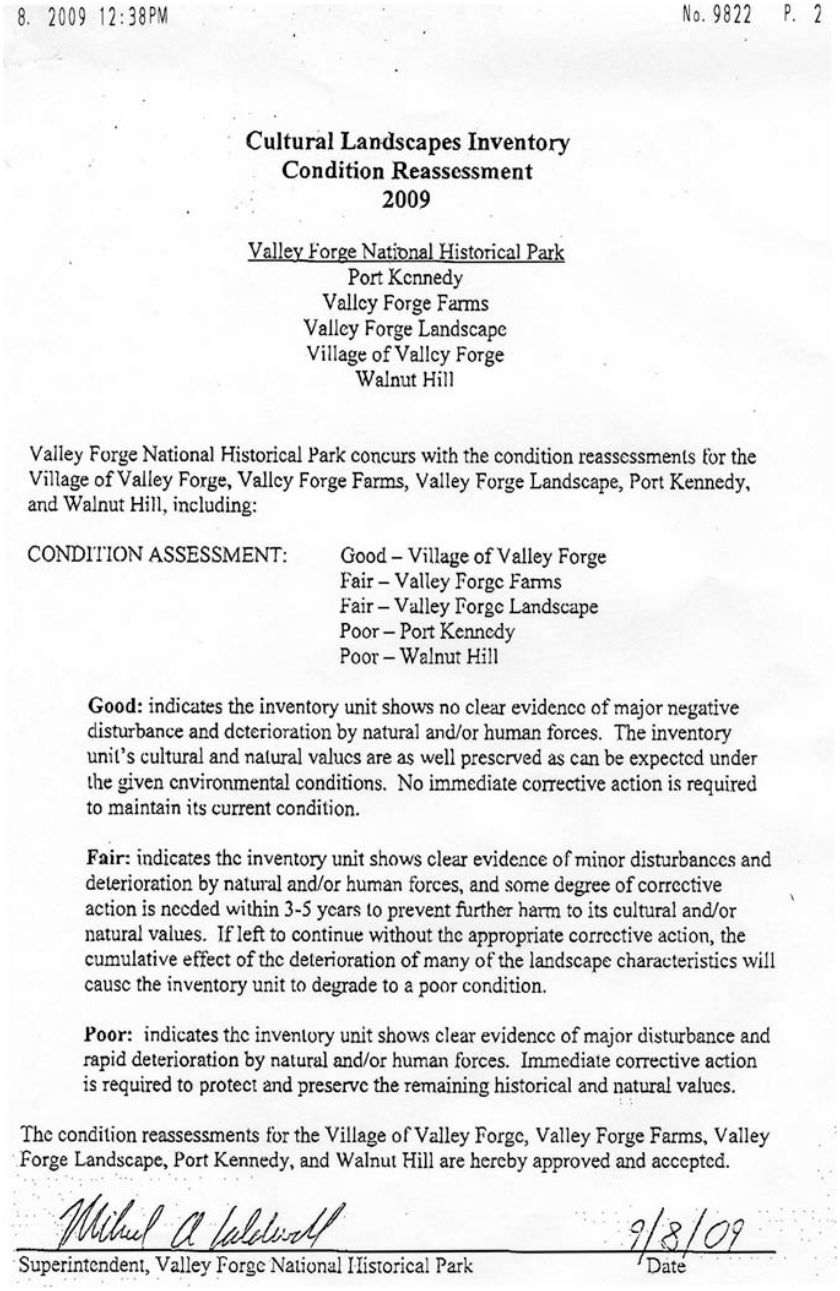
The original CLI for Walnut Hill was approved by the Park Superintendent on September 5, 2002 and the Pennsylvania State Historic Preservation Office (SHPO) on September 16, 2004. Condition reassessments for Walnut Hill were approved by the superintendent on September 26, 2003 and September 8, 2009. The original CLI relied upon the primary and secondary source material available at Valley Forge National Historical Park. It was written by Liz Sargent and entered into the CLI database by N.J. Brown, who also prepared the report for the 2004 SHPO review. Field work and site plan revisions for this CLI update were completed by Tim Layton and Rebekah Everett in the summer of 2019. Text and graphics were finalized by Tim Layton and Jeff Killion.

SUMMARY OF CLI REVISIONS, 2024

Updates that have made to the Walnut Hill CLI since the 2004 and 2009 versions include revisions to the National Register section to reflect updated National Register documentation that was completed in 2016 (including additional areas of significance and extension of the period of significance to 1949); updating the Chronology and Physical History sections to document changes in the landscape since 2004; updating the site plans; updating the Analysis and Evaluation chapter with expansion of the inventoried features; updated photographs; and assessment of the overall landscape condition. Field work for this update was completed in 2019 by Tim Layton and Rebekah Everett, and editing was completed by Tim Layton and Jeff Killion in 2022. Upon approval by the Park Superintendent, this update will supersede all previous versions of the Walnut Hill CLI.

Concurrence Graphic Information:

Attachment File Path



8. 2009 12:38PM No. 9822 P. 2

Cultural Landscapes Inventory
Condition Reassessment
2009

Valley Forge National Historical Park
Port Kennedy
Valley Forge Farms
Valley Forge Landscape
Village of Valley Forge
Walnut Hill

Valley Forge National Historical Park concurs with the condition reassessments for the Village of Valley Forge, Valley Forge Farms, Valley Forge Landscape, Port Kennedy, and Walnut Hill, including:

CONDITION ASSESSMENT:
Good – Village of Valley Forge
Fair – Valley Forge Farms
Fair – Valley Forge Landscape
Poor – Port Kennedy
Poor – Walnut Hill

Good: indicates the inventory unit shows no clear evidence of major negative disturbance and deterioration by natural and/or human forces. The inventory unit's cultural and natural values are as well preserved as can be expected under the given environmental conditions. No immediate corrective action is required to maintain its current condition.

Fair: indicates the inventory unit shows clear evidence of minor disturbances and deterioration by natural and/or human forces, and some degree of corrective action is needed within 3-5 years to prevent further harm to its cultural and/or natural values. If left to continue without the appropriate corrective action, the cumulative effect of the deterioration of many of the landscape characteristics will cause the inventory unit to degrade to a poor condition.

Poor: indicates the inventory unit shows clear evidence of major disturbance and rapid deterioration by natural and/or human forces. Immediate corrective action is required to protect and preserve the remaining historical and natural values.

The condition reassessments for the Village of Valley Forge, Valley Forge Farms, Valley Forge Landscape, Port Kennedy, and Walnut Hill are hereby approved and accepted.

Michael A Caldwell 9/8/09
Superintendent, Valley Forge National Historical Park Date

CLI condition reassessment form, September 8, 2009.

Cultural Landscapes Inventories
Level II

Valley Forge National Historical Park:
Valley Forge Landscape
Port Kennedy
Valley Forge Farms
Village of Valley Forge
Walnut Hill

Valley Forge National Historical Park concurs with the findings of the Level II inventories for the Valley Forge Landscape, Port Kennedy, Valley Forge Farms, Village of Valley Forge, and Walnut Hill, including the following specific components:

MANAGEMENT CATEGORY: Not specified

CONDITION ASSESSMENT:

Valley Forge Landscape: Fair
Port Kennedy: Poor
Valley Forge Farms: Fair
Village of Valley Forge: Fair
Walnut Hill: Fair

Good: indicates the inventory unit shows no clear evidence of major negative disturbance and deterioration by natural and/or human forces. The inventory unit's cultural and natural values are as well preserved as can be expected under the given environmental conditions. No immediate corrective action is required to maintain its current condition.

Fair: indicates the inventory unit shows clear evidence of minor disturbances and deterioration by natural and/or human forces, and some degree of corrective action is needed within 3-5 years to prevent further harm to its cultural and/or natural values. If left to continue without the appropriate corrective action, the cumulative effect of the deterioration of many of the character defining elements, will cause the inventory unit to degrade to a poor condition.

Poor: indicates the inventory unit shows clear evidence of major disturbance and rapid deterioration by natural and/or human forces. Immediate corrective action is required to protect and preserve the remaining historical and natural values.

The Level II Cultural Landscapes Inventories for the Valley Forge Landscape, Port Kennedy, Valley Forge Farms, Village of Valley Forge, and Walnut Hill in Valley Forge National Historical Park are hereby approved and accepted.

Superintendent, Valley Forge National Historical Park 9/5/02 Date

Note: Concurrence is subject to the condition that the conditions are re-evaluated within one calendar year of the signature date.

CLI concurrence form, September 5, 2002.

Cultural Landscapes Inventories
Condition Reassessment 2003

Valley Forge National Historical Park:
Valley Forge Landscape
Port Kennedy
Valley Forge Farms
Village of Valley Forge
Walnut Hill

Valley Forge National Historical Park concurs with the following condition reassessments for the Valley Forge Landscape, Port Kennedy, Valley Forge Farms, Village of Valley Forge, and Walnut Hill:

CONDITION REASSESSMENT:

Valley Forge Landscape: Fair
Port Kennedy: Poor
Valley Forge Farms: Fair
Village of Valley Forge: Fair
Walnut Hill: Poor

Good: indicates the inventory unit shows no clear evidence of major negative disturbance and deterioration by natural and/or human forces. The inventory unit's cultural and natural values are as well preserved as can be expected under the given environmental conditions. No immediate corrective action is required to maintain its current condition.

Fair: indicates the inventory unit shows clear evidence of minor disturbances and deterioration by natural and/or human forces, and some degree of corrective action is needed within 3-5 years to prevent further harm to its cultural and/or natural values. If left to continue without the appropriate corrective action, the cumulative effect of the deterioration of many of the character defining elements, will cause the inventory unit to degrade to a poor condition.

Poor: indicates the inventory unit shows clear evidence of major disturbance and rapid deterioration by natural and/or human forces. Immediate corrective action is required to protect and preserve the remaining historical and natural values.

The condition reassessments for the Valley Forge Landscape, Port Kennedy, Valley Forge Farms, Village of Valley Forge, and Walnut Hill in Valley Forge National Historical Park are hereby approved and accepted.

Superintendent, Valley Forge National Historical Park — Date 9/26/03

CLI condition reassessment form, September 26, 2003.

United States Department of the Interior

NATIONAL PARK SERVICE
Northeast Region
200 Chestnut Street
Philadelphia, PA 19106-2878

IN REPLY REFER TO:

H30 (NER-RS&S)

August 20, 2004

Ms. Jean Cutler
Pennsylvania Historical & Museum Commission
Bureau for Historic Preservation
Commonwealth Keystone Bldg, 2nd Floor
440 North Street
Harrisburg, PA 17120-0093

Dear Ms. Cutler:

Enclosed you will find a copy of five Cultural Landscapes Inventory (CLI) reports for Valley Forge National Historical Park. They provide detailed landscape information on the following landscapes:

Valley Forge Landscape
Port Kennedy
Valley Forge Farms
Village of Valley Forge
Walnut Hill

Your office received copies of this information in its original form soon after it was prepared by the National Park Service (NPS) and Oculus in 1998 and 2000, but we do not have a record of your response. Since then this information has been entered into the NPS cultural landscapes database and we are now sending you the reports from the database. We now request a consensus determination regarding our findings of significance for the property, specifically which landscape characteristics and associated features contribute to the significance (see the attached lists). In order to meet agency inventory goals, we need your response prior to September 15, 2004.

Through the CLI program, the NPS is currently in the midst of a nationwide effort to inventory its cultural landscapes. The CLI is conducted in accordance with Section 110 of the National Historic Preservation Act of 1966 (as amended). It is an inventory of baseline information for all culturally and historically significant landscapes within the national park system, and it examines multiple landscape features that contribute to the significance of historic properties. The CLI process includes gathering information from existing secondary sources, as well as through on-site reconnaissance of the existing landscape. The information collected provides a comprehensive look at the historical development and significance of the landscape, placing it in context of the properties' overall significance. For landscapes found potentially eligible for the National Register of Historic Places (NRHP), the evaluation describes their characteristics

SHPO concurrence letter, September 16, 2004, page 1 of 3.

and associated features and assesses the landscape's overall historical integrity. It also raises questions about the landscape that require further study.

It is important to note that the CLI reports are not intended as comprehensive inventory reports for any one property, although for some districts and sites, they provide fuller documentation than for others. For example, the reports do not include a full architectural description of structures, but document structures as elements of the overall landscape, and similarly document other characteristics such as vegetation, spatial organization, and views and vistas. The CLI is one component of the NPS inventory effort. The NPS List of Classified Structures (LCS) inventory, for example, includes structural features of cultural landscapes, but the CLI takes a more comprehensive approach to the properties, inventorying all above-ground resources in each park in which the NPS has a legal or mandated interest. As of August, 2004, there are several findings on structures in this CLI that differ from early LCS findings. The LCS will be updated in the next fiscal year to resolve discrepancies.

Valley Forge State Park was designated a National Historic Landmark (NHL) on January 20, 1961 and listed in the National Register of Historic Places on October 15, 1966. On July 4, 1976, Congress enacted Public Law 94-337 authorizing Valley Forge National Historical Park... "to preserve and commemorate for the people of the United States the area associated with the heroic suffering, hardship, and determination and resolve of General Washington's Continental Army during the winter of 1777-1778 at Valley Forge." Valley Forge National Historical Park National Register documentation was accepted by the Keeper on February 26, 1988, with a Supplemental Listing Record signed by the Keeper on October 28, 1988. The park's National Register documentation is currently being revised, and when this is complete this CLI will also be updated to reflect any changes.

The 1988 National Register documentation lists Valley Forge National Historical Park as significant in five areas:

I. The Revolution: The Beginnings of the American Army, 1777-1778
II. Sculpture and Monuments, 1901-1938
III. Industry, 18th to early 20th century
IV. Architecture, 18th and early 20th century
V. Ruins, early 18th to mid-19th century

The park derives significance under Criterion A for the encampment of the continental army and its post-war commemoration. It is also significant under Criterion B for its association with individuals important to our history, such as George Washington and Friedrich von Steuben. Buildings related to the encampment and commemoration, industry, and agriculture are significant under Criterion C, architecture. Ruins and archeological sites of the area are significant under Criterion D. The 1988 National Register documentation established 1742 as the beginning date for the period of significance. The end date, established by the Supplement Listing Record, is 1938.

The post-encampment agricultural associations and the association with recreation during its years as a state park may achieve significance at the state or local level. Some landscape characteristics of the site, such as spatial organization and vegetation are not discussed in the existing National Register documentation, and are documented in these CLIs. These issues will be resolved in the updated National Register documentation, which may also extend the period of significance.

Within each CLI, we call your particular attention to the Statement of Significance (end of Part 1), the Analysis and Evaluation Summary (beginning of Part 3) and the National Register Information (near the beginning of Part 4).

SHPO concurrence letter, September 16, 2004, page 2 of 3.

ER# 01-4112-091-B

Based on the enclosed CLI reports, we seek your concurrence on the following:

- the landscapes of Valley Forge, and the component landscapes of Port Kennedy, Valley Forge Farms, Village of Valley Forge, and Walnut Hill contribute to the significance of the park in the following areas:

- Valley Forge Landscape: Military, Conservation, Architecture, Agriculture, Industry, Entertainment/Recreation
- Port Kennedy: Military, Industry, Architecture, Archeology (Prehistoric), Conservation
- Valley Forge Farms: Military, Agriculture, Politics/Government, Archeology (Historic-Non-Aboriginal and Prehistoric), Architecture, Conservation, Industry, Exploration/Settlement
- Village of Valley Forge: Military, Conservation, Industry, Archeology (Historic-Non-Aboriginal and Prehistoric), Entertainment/Recreation, Architecture, Transportation
- Walnut Hill: Agriculture, Military, Archeology (Historic-Non-Aboriginal and Prehistoric), Architecture

- that certain landscape characteristics and features contribute to the significance of the property (see enclosed lists).

If you concur with our evaluation of the Valley Forge landscape resources, please sign on the spaces provided below, and return prior to September 15, 2004. Please return the letter and any inquiries or comments to:

Nancy J. Brown
Co-CLI Program Coordinator
National Park Service, Olmsted Center for Landscape Preservation
200 Chestnut St., 3rd Floor
Philadelphia, PA 19106

Should you have any questions, please contact Ms. Brown at (215) 597-8863. We appreciate any efforts you can make to expedite this review.

Sincerely,

for Marie Rust
Regional Director

Enclosures

cc:
Arthur Stewart, Superintendent

I concur with the above-stated evaluation and contributing and non-contributing landscape features of the Valley Forge Landscape, Port Kennedy, Valley Forge Farms, Village of Valley Forge, and Walnut Hill in Valley Forge National Historical Park.

Pennsylvania State Historic Preservation Officer

9/16/04
Date

SHPO concurrence letter, September 16, 2004, page 3 of 3.

Cultural Landscapes Inventory
CLI Updates Certification Form
2024

Valley Forge National Historical Park
Core Encampment Area, Port Kennedy, Valley Forge Farms, Village of Valley Forge, and Walnut Hill

Valley Forge National Historical Park certifies the CLI updates for the Core Encampment Area, Port Kennedy, Valley Forge Farms, Village of Valley Forge, and Walnut Hill including:

CONDITION ASSESSMENT:
Fair – Core Encampment Area
Poor – Port Kennedy
Fair – Valley Forge Farms
Good – Village of Valley Forge
Fair – Walnut Hill

Good: indicates the inventory unit shows no clear evidence of major negative disturbance and deterioration by natural and/or human forces. The inventory unit's cultural and natural values are as well preserved as can be expected under the given environmental conditions. No immediate corrective action is required to maintain its current condition.

Fair: indicates the inventory unit shows clear evidence of minor disturbances and deterioration by natural and/or human forces, and some degree of corrective action is needed within 3-5 years to prevent further harm to its cultural and/or natural values. If left to continue without the appropriate corrective action, the cumulative effect of the deterioration of many of the character defining elements, will cause the inventory unit to degrade to a poor condition.

Poor: indicates the inventory unit shows clear evidence of major disturbance and rapid deterioration by natural and/or human forces. Immediate corrective action is required to protect and preserve the remaining historical and natural values

The CLI updates for Core Encampment Area, Port Kennedy, Valley Forge Farms, Village of Valley Forge, and Walnut Hill at Valley Forge National Historical Park are hereby approved and accepted.

Digitally signed by ROSALYN FENNELL
Date: 2024.02.20 17:04:59 -05'00'

February 20, 2024

Superintendent, Valley Forge National Historical Park — Date

CLI certification form, February 20, 2024.

Revision:

Revised By	Type of Revision	Revision Date	Revision Narrative
Lisa Nowak	Change in Condition	09/08/2009	Condition reassessment completed as scheduled.
Jeff Killion	Other	02/20/2024	Three levels of effort have been developed for CLI Updates: A, B, and C. Level C is limited to a condition reassessment of the landscape; Level B includes C and is a targeted update of select data fields; Level A includes C and is a comprehensive update of all data fields. This 2024 update to the Walnut Hill CLI has been conducted at a Level A effort.

Geographic Information

State and County:

State	County
Pennsylvania	Montgomery County

Size (Acres): 470.91

Land Tract Number(s)

101-30, 1,683.15 acres (portion of 1683-acre tract is in CLI boundary);
101-55, 24.0 (portion of 24-acre tract is in CLI boundary);
101-60, 78.0;
101-61, 57.0;
101-78, 9.50.

Boundary Description:

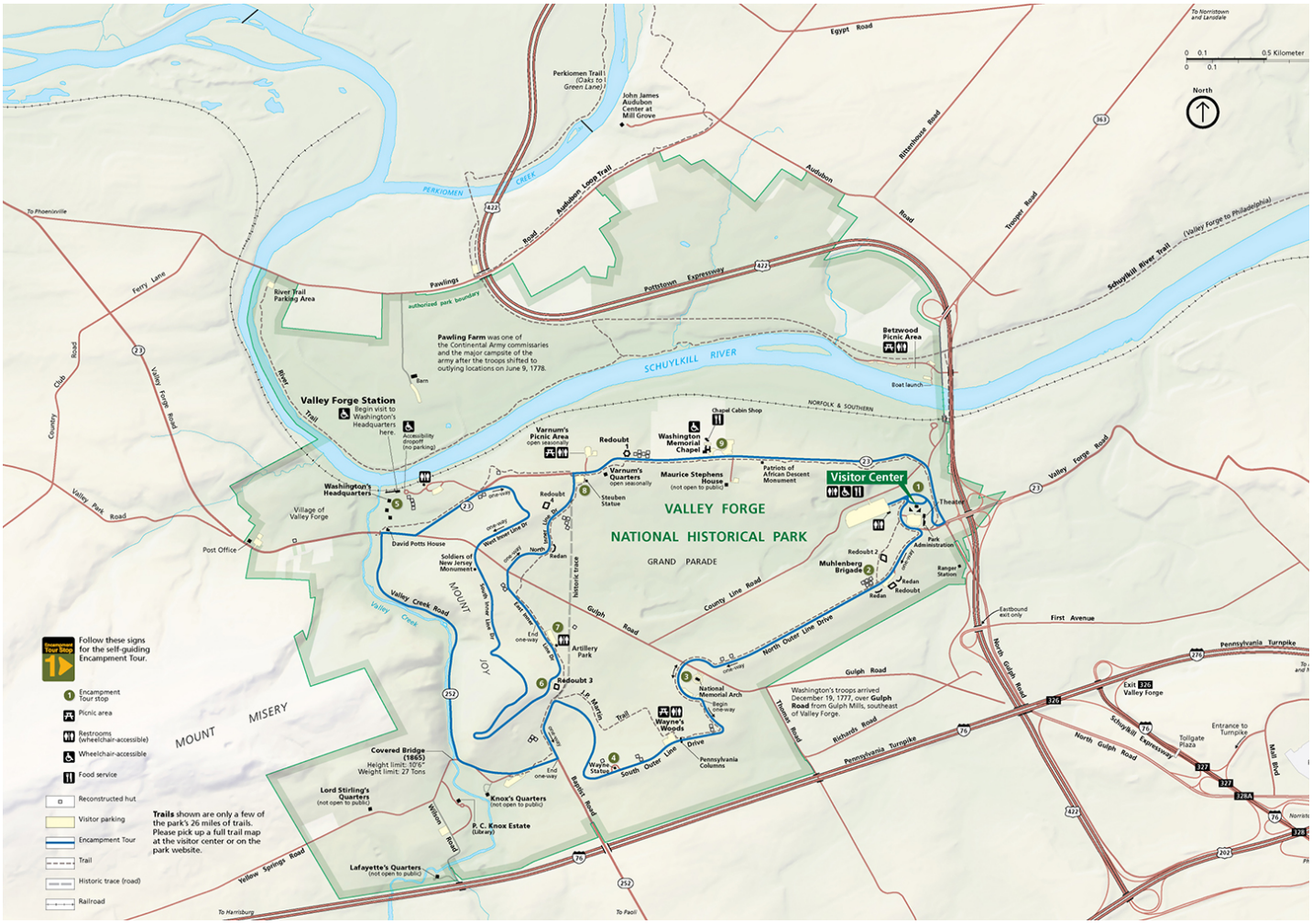
The Walnut Hill component landscape boundary has been configured to encompass the majority of the sites and features associated with eighteenth and nineteenth century Pawling and Wetherill properties that lie within Valley Forge National Historical Park boundaries.

The boundary of the component landscape may be described as follows:
Edged to the north by Pawling's Road, the authorized boundary of Valley Forge National Historical Park, and by Route 422—the Pottstown Expressway. Approximately one half mile from the intersection of Route 422 and Pawling's Road, the boundary heads due south to encompass the Sullivan's Bridge Monument and the Revolutionary War-era site of Sullivan's Bridge until it reaches the southern bank of the Schuylkill River. The boundary follows the southern and western bank of the river until it joins the park boundary, concurrent with the Montgomery County line, northwest of the Washington's Headquarters area. The component landscape boundary follows the park boundary to its junction with the northwestern boundary at Pawling's Road and its bridge across the Schuylkill River.

Boundary Coordinates

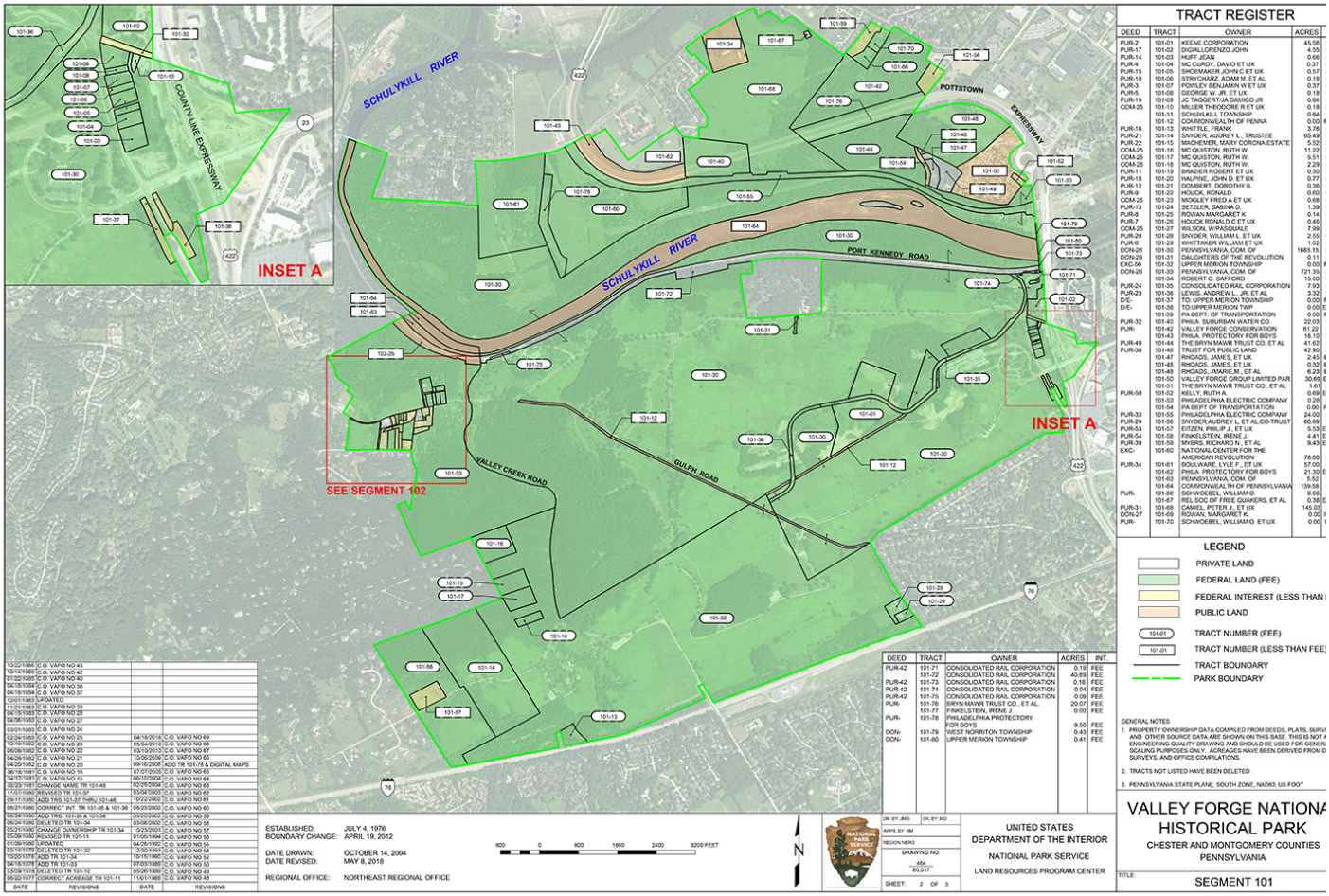
Source	Type of Point	Latitude	Longitude	Narrative
GIS	Area	40.11444142	-75.45442892	
GIS	Area	40.11271345	-75.4526492	
GIS	Area	40.1121366	-75.45122118	
GIS	Area	40.1120239	-75.44695993	
GIS	Area	40.11219806	-75.44388131	
GIS	Area	40.10841938	-75.44352403	
GIS	Area	40.10681023	-75.4494907	
GIS	Area	40.10620663	-75.45104635	
GIS	Area	40.10485623	-75.45367518	
GIS	Area	40.10348659	-75.45771892	
GIS	Area	40.1025622	-75.4616947	
GIS	Area	40.10293504	-75.46384473	
GIS	Area	40.10488683	-75.46682387	
GIS	Area	40.105086	-75.4663433	
GIS	Area	40.10707819	-75.46916477	
GIS	Area	40.10869439	-75.4703441	
GIS	Area	40.11187004	-75.47174095	
GIS	Area	40.11483907	-75.47087904	
GIS	Area	40.11397796	-75.46808519	
GIS	Area	40.11146948	-75.46931793	
GIS	Area	40.11093075	-75.46153753	
GIS	Area	40.11342421	-75.46166772	
GIS	Area	40.11364063	-75.45744441	

Location Map:



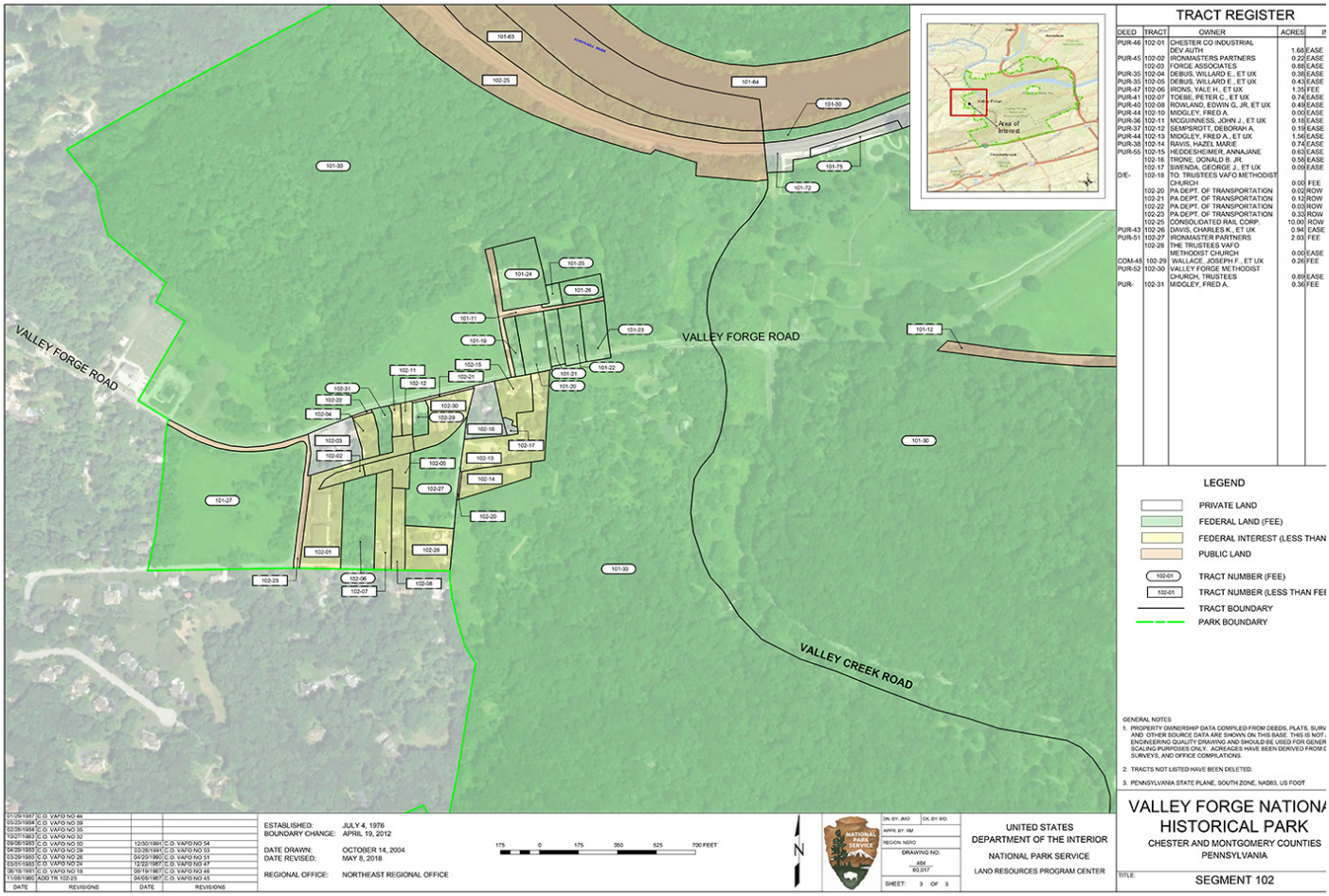
Map of Valley Forge NHP. (NPS Harpers Ferry Center, https://www.nps.gov/carto/app/#!/maps/alphacode/VAFO)


0.5 Mile
KING
OF
PRUSSIA
MALL



Land tract map, 2018. (NPS, Land Resources Program Center)





Land tract map, 2018. (NPS, Land Resources Program Center)



Regional Landscape Contexts:

Type of Context: Cultural

Description:

Valley Forge National Historical Park is a popular regional attraction that draws many thousands of visitors each year. It is located 18 miles from the City of Philadelphia on the western outskirts of a heavily developed suburban and commercial corridor known as King of Prussia. The corridor includes one of the region's largest shopping malls, various conference centers and commercial developments, an extensive collection of residential neighborhoods and subdivisions, and numerous commuter thoroughfares that provide access to the Pennsylvania Turnpike and the Schuylkill Expressway. While the village of Phoenixville is located a few miles to the west of Walnut Hill, and the village of Valley Forge is located directly across the river, the Perkiomen Peninsula remains relatively sparsely settled.

Type of Context: Physiographic

Description:

Valley Forge National Historical Park is located in the Piedmont Province of Southeastern Pennsylvania. The Walnut Hill component landscape occupies the southern half of the peninsula of land created by a bend of the Schuylkill River near its confluence with Perkiomen Creek that is underlain by sandstone, mudstone, and shale. The northern portion of the site is characterized by a gently sloping upper river terrace, edged by a more steeply sloped escarpment that falls away toward the river floodplain. Both the upper terrace and the floodplain are covered by fertile soils that have supported extensive agricultural use for well over two hundred years.

Type of Context: Political

Description:

The Walnut Hill component landscape is located wholly within the Lower Providence Township of Montgomery County, Pennsylvania. It falls within the boundaries of Valley Forge National Historical Park, and is currently administered by the National Park Service to commemorate the Revolutionary War encampment of the Continental Army.

Management Information

General Management Information

Management Category: Must be Preserved and Maintained

Management Category Date: 09/05/2002

Management Category Explanatory Narrative:

As approved by the Park Superintendent on September 5, 2002, the Walnut Hill component landscape meets the "Must be Preserved and Maintained" management category because the component landscape is nationally significant as defined by National Historic Landmark criteria and is related to the park's legislated significance. A portion of the Walnut Hill area was part of the Valley Forge State Park, which was designated a National Historic Landmark in 1961 (boundary increased in 1975) and transferred from the Commonwealth of Pennsylvania to the Department of the Interior in 1976. Valley Forge National Historical Park was officially established in 1976, "…to preserve and commemorate for the people of the United States the area associated with the heroic suffering, hardship, and determination and resolve of General George Washington's Continental Army during the winter of 1777–1778 at Valley Forge…" Although the enabling legislation does not mention Walnut Hill name, the area was directly associated with the encampment. It is also included on the boundary map that is referenced in the legislation. (FD 2019: 50-51)

Management Agreements:

Type of Agreement: None

Management Agreement Expiration Date:

Management Agreement Explanatory Narrative:

Legal Interests:

Type of Interest: Fee Simple

Narrative: Tracts 101-30, 101-55, 101-60, 101-61, and 101-78

Located in managed wilderness?: Unknown

Adjacent Lands Information

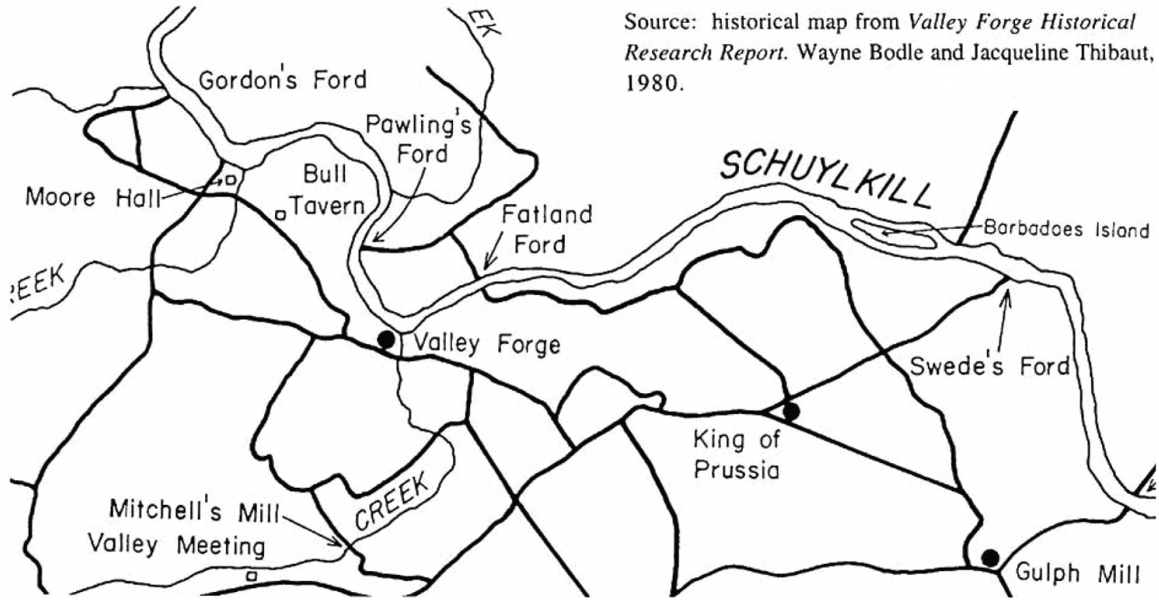
Do Adjacent Lands Contribute? Yes

Adjacent Lands Narrative:

Adjacent lands are lands outside the cultural landscape boundary, including lands inside or outside the park. There are various sites and resources on the Perkiomen peninsula with strong connections with the Walnut Hill component landscape. These sites and resources, associated with eighteenth and nineteenth century Pawling and Wetherill family property ownership, include Mill Grove, Fatlands, the William Pawling property, and privately-held lands north and east of Meadow Grove.

To the north of Pawling's Road along Perkiomen Creek is the Mill Grove property. It was part of the original Henry Pawling property and was later owned by the Wetherill family. It was owned by Rowland Evans during the encampment period, and is traditionally believed to have served as officer's quarters. The Audubon family owned it during the first part of the nineteenth century; J.J. Audubon referred to the property in his seminal work Birds of America. The Fatlands property to the east of Walnut Hill was variously owned by Pawling and Wetherill family members during the eighteenth and nineteenth centuries, and contributed to the important scientific agricultural evolution discussed as part of the Wetherill family history at Walnut Hill history. The William Pawling property to the east of the component landscape boundary also has family ownership associations. It was historically part of the land owned by Henry Pawling I. It was owned and administered by the Catholic Church but is now owned by the park.

Adjacent Lands Graphic:



Map of lands surrounding the Walnut Hill area. (Sargent & Lloyd, 2004)

National Register Information

National Register of Historic Places

Documentation Status: Entered Documented

Documentation Narrative Description:

On the nation's bicentennial, July 4, 1976, President Gerald R. Ford signed the act establishing Valley Forge National Historical Park. However, National Historic Landmark designations and National Register of Historic Places listings of the park and several individual resources occurred earlier, when the park was part of the state park system in the Commonwealth of Pennsylvania.

On January 20, 1961, the 2,300-acre Valley Forge State Park was designated a National Historic Landmark (NHL) under Theme X, "The War for Independence." The National Survey of Historic Sites and Buildings form noted extensive remains of major forts, miles of earthworks, the artillery park, Washington's headquarters house, quarters of other top officers, the Grand Parade Ground, museum, a reconstructed officers' hut, memorials and monuments, and historical markers. It also noted an observation tower (since removed) that "affords a comprehensive view of the camp site and the country-side." The form did not describe any features at the Walnut Hill.

The park was administratively listed in the National Register on October 15, 1966 with the passage of the National Historic Preservation Act. On October 10, 1975, NHL/National Register documentation was updated when Valley Forge State Park was enlarged from 2,300 to 2,515 acres. The NHL theme was re-designated as "Major American Wars, Revolution." National Register significance was identified in the area of Military for the eighteenth century, with specific dates December 1777 to June 1778. No specific features were described at Walnut Hill.

On October 28, 1988, the National Register documentation for what was by this time Valley Forge National Historical Park, was updated to address resources not associated with the park's primary area of significance as a military encampment. New areas of significance for the 3,464-acre district included Archeology-Historic, Architecture, Industry, and Sculpture for the mid eighteenth to early nineteenth century. A specific beginning date for the period of significance was not identified, but a Supplementary Listing Record dated October 28, 1988 ended the period of significance in 1938 to include the events and activities that commemorated the Revolutionary War encampment in the twentieth century. The documentation also identified specific resources at Walnut Hill: Henry Pawling's Farm ("Walnut Hill") as the site of the Commissary Department of the Army, Meadow Grove Spring House, Walnut Hill Estate Barn, Walnut Hill Lean-to-Barn (no longer extant), Walnut Hill Mansion (now Pawling's House), Walnut Hill Privy and Storage Building, Walnut Hill Springhouse/Gatehouse, Walnut Hill Stone Corral, Walnut Hill Tenant House, and Walnut Hill Tenant House Outbuilding (now Smokehouse Ruin).

On September 16, 2004, the Pennsylvania State Historic Preservation Office (SHPO) concurred with the NPS on the findings of a Cultural Landscape Inventory (CLI) for the 471-acre Walnut Hill site. The 2004 CLI identified significance in the areas of Agriculture, Archeology (Historic-Non-Aboriginal and Prehistoric), Architecture, and Military, and the period of significance as 1742–1938, beginning when the Mount Joy Forge began operations on Valley Creek, and ending when commemorative efforts were completed. Specific features in the Walnut Hill area are listed in the Analysis and Evaluation chapter of this CLI.

On June 18, 2016, National Register documentation was updated for Valley Forge National Historical Park to define the National Register criteria under which the district derived its significance, establish legally defensible National Register boundaries, and provide a full accounting of contributing and non-contributing resources. Significance for the 3,263-acre district was identified in the areas of Agriculture, Archeology (Historic- Non-Aboriginal), Archeology (Prehistoric), Architecture, Art, Conservation, Engineering, Landscape Architecture, Industry, Military History, Other (Commemoration), and Politics/Government. The periods of significance were identified as 8000 BCE–1600 CE for archeology and ca.1710–1949 for the

other areas, beginning with the development of the eighteenth-century road network and ending when the restoration-focused development program at the state park was completed. Specific features in the Walnut Hill area are listed in the Analysis and Evaluation chapter of this CLI. Three features identified as undetermined in the 2004 CLI were reevaluated as contributing in the 2016 National Register: Estate Retaining Wall, Spring House Retaining Wall, and Stone Gate Post System.

According to research conducted for this CLI Update and the categories of National Register documentation outlined in the "CLI Professional Procedures Guide," the areas and periods of significance for the Walnut Hill landscape are adequately documented in the 2002 CLI and in the 2016 National Register. The existing documentation adequately describes the landscape's numerous historic resources that contribute to its significance. Therefore, for purposes of the CLI, the Walnut Hill landscape is considered "Entered-Documented."

Eligibility: Eligible -- Keeper

Concurrence Eligibility Date: 06/18/2016

Concurrence Narrative:

Significance Level: National

Contributing: Contributing

Classification: District

Statement of Significance for National Register of Historic Places:

Valley Forge National Historical Park Historic District:
Valley Forge National Historical Park (NHP), including Walnut Hill, was designated as a National Historic Landmark (NHL) in 1961. The Valley Forge National Historical Park (NHP) Historic District possesses significance at the national, state, and local levels under National Register Criteria A, B, C, and D in the areas of Agriculture, Archeology (Historic-Non Aboriginal), Archeology (Prehistoric), Architecture, Art, Conservation, Engineering, Landscape Architecture, Industry, Military History, Other (Commemoration), and Politics/Government. The period of significance for the park includes the years 8000 BCE–1600 CE and ca.1710–1949. The former period encompasses the Early Archaic through Late Woodland periods during which the district, as evidenced by the presence of significant archeological sites, was occupied by Native Americans. The latter period includes the years when the district achieved its primary national significance as the site of the Continental Army's encampment during the winter and spring of 1777–1778. The years between ca.1710 and 1777–1778 and through the late nineteenth century, represent locally significant periods of agricultural and industrial development of Valley Forge and include the construction dates for a number of architecturally significant resources, as well as the overlapping period between 1876 and 1949 during which the nationally significant events associated with the conservation and commemoration of the Valley Forge encampment site occurred. The 1949 end date of significance corresponds to the year that the restoration-focused development program laid out by the Valley Forge Park Commission in 1936 and overseen by preservation architect George Edwin Brumbaugh was completed. This milestone marked the end of the early state park development period, in which a succession of clearly defined overarching goals informed the direction of the commission's activities. The character of subsequent development efforts varied greatly in response to shifting priorities, external pressures, changes in park oversight, and new management trends, with later projects often reversing or removing evidence of previous work. Consequently, the existing commemorative landscape most closely resembles the state park of the mid-twentieth century. Several resources in the Historic District also meet

Criteria Considerations: B (moved property), E (reconstructed property), and F (commemorative property).

Walnut Hill:
Based on the 2016 National Register documentation, Walnut Hill, as a component landscape of Valley Forge NHP, is significant under Criterion A in the areas of Military History, Agriculture, Conservation, and Commemoration; under Criterion C in the area of Architecture; and under Criterion D in the area of Pre-Historic Archeology. These areas of significance are described below. The period of significance is the same as the larger historic district, 8000 BCE–1600 CE and ca.1710–1949; however the earliest extant landscape feature at Walnut Hill dates to the 1745 Pawling House.

CRITERION A

Military History:
Walnut Hill is significant at the national level in the area of Military History as the site of Continental Army's encampment at Valley Forge from December 19, 1777 to June 19, 1778, which ranks among the most famous events of the Revolutionary War. Valley Forge was the site where General George Washington moved the main body of the Continental Army into winter quarters after failing to prevent the British capture of Philadelphia in the fall of 1777. During the first few months at Valley Forge, the poorly provisioned army faced fluctuating, often unpleasant, winter weather; severe privation; disease; and long periods of inactivity that had a deleterious effect on morale. Held together by Washington's leadership, those present at the encampment – including men from all 13 original states, African American and Native American enlisted men, and hundreds of camp followers (e.g., wives, children, mothers, and sisters of the soldiers) – displayed a resolute determination to endure and overcome the hardships. Ill-clothed and working on poor rations, they constructed the camp's fortifications and housing to shelter them during their stay. After the worst of the supply shortages were resolved by improvements made in the commissary and quartermaster departments, the troops were occupied throughout much of the spring by a new training regimen devised by Baron Friedrich von Steuben to improve their field maneuvers and fighting abilities. As a result, the army emerged as a cohesive and competent unit, more capable of meeting the professional British army on even terms. The redeeming story of the Valley Forge encampment subsequently came to symbolize the extent to which the American citizen-soldier was willing to suffer and sacrifice for the causes of freedom and liberty. (NR 2016, Sec.8: 119)

At the time of the Continental Army's encampment across the Schuylkill River at Valley Forge, the Pawling family owned the majority of the land within the Walnut Hill component landscape. The British Army is known to have passed through Valley Forge on September 23, 1777, on route to occupying Philadelphia. They crossed the Schuylkill at Fatland Ford, heading north along the road between the Pawling and adjacent Vaux properties.

Walnut Hill is primarily associated with the use and development of the land during the Continental Army's occupation of the area from December 19, 1777 to June 19, 1778. During that time, the area's existing agricultural and industrial landscape was overlaid with a military layer that included fortifications, training and supply areas, and accommodations for officers and enlisted men. A (draft) Development Concept Plan (DCP) prepared by the National Park Service suggests that the Walnut Hill property may have been used for some commissary activities, a sentry station, a grazing area, and temporary bivouac sites. Although exact locations of these uses are difficult to discern, Walnut Hill's strategic position made such uses integral to the encampment. (NR 2016, Sec.8: 124; DCP 1994: 3)

Interpretation of various letters dating from winter 1777 through spring 1778 indicate that commissary officials were quartered on the Pawling property. A mill operated by the family likely supplied flour and possibly lumber to the encampment, and a market was established at the northern terminus of a bridge—known as Sullivan's Bridge—constructed by the army across the Schuylkill. Soldiers are known to have visited the property to attend the market, and to escape life in the camp. Period letters suggest that a guard house was constructed at Sullivan's Bridge to monitor and prevent soldiers from these unauthorized visits to the Pawling property. The market was relocated in spring 1778 to the southern side of the bridge to keep order by preventing the soldiers from straying from camp. Walnut Hill served as an important grazing area for the Army's transport horses. (DCP 1994: 13)

The troops in Valley Forge suspended exercises after May 20 in anticipation of the British evacuation of

Philadelphia. At the beginning of June, portions of the army crossed Sullivan's Bridge and moved into tents north of the Schuylkill River, transitioning from stationary to field status and completing their preparations for battle. The British left Philadelphia on June 18, and Washington dispatched two brigades to follow closely on their heels. That day and the next, the bulk of the army, consisting of 15,000 or more infantry, cavalry, and artillery men, crossed the river via Sullivan's Bridge and across the Walnut Hill farmlands on the north side as they headed toward New Jersey (NR 2016, Sec.8: 135)

Conservation:
Walnut Hill is significant at the national level in the area of Conservation for its association for its contributions to the history of historic preservation and its associations with national trends in the commemoration of the Revolutionary War during the late nineteenth and early twentieth century. The effort initiated after the nation's Centennial in 1876 by the Centennial and Memorial Association of Valley Forge to preserve the house where Washington made his headquarters during the encampment reflected the resurgent public interest in colonial history that characterized the American Colonial Revival and house museum movements of the late nineteenth century. The creation of Valley Forge State Park in 1893 was a seminal event in the history of historic site preservation in the United States. Occurring during the nascent stage of the American battlefield preservation movement, when the United States Congress made its first commitments toward establishing national military parks at important Civil War battlefield sites, the establishment of the state park represented the first successful public effort to preserve a large area of land associated with a Revolutionary War event. Valley Forge was also the first state park in the nation established to preserve a site of historical significance and the first park of any kind created by the Commonwealth of Pennsylvania. (NR 2016, Sec.8: 136)

Concurrent with the state park's establishment was the creation of the Valley Forge Park Commission (VFPC), which acquired on behalf of the State certain ground at Valley Forge for a public park "to be laid out, preserved and maintained forever as a public place or park by the name of Valley Forge, so that the same and the fortifications thereon may be maintained as nearly as possible in their original condition as a military camp." (NR 2016, Sec.8: 148,154,158, citing VFPC 1907b: 5)

State park lands would eventually extend into the Walnut Hill area. The first general development plan for Valley Forge State Park was completed in 1936 and used ideas and concepts first outlined in a 1932–1935 comprehensive plan drawn up by the VFPC but not fully carried out. The 1936 report also reflected the evolving framework guiding the VFPC's land acquisition policies, recommending that in addition to the encampment lands themselves, "sufficient land bordering the encampment area should be acquired in order that the natural landscape character of the entire area may be preserved and to establish a protective belt against encroachments." In 1942 the Commonwealth of Pennsylvania acquired by condemnation 42 acres of the former Meadow Grove and Walnut Hill properties along the Schuylkill River as a visual buffer for Valley Forge State Park. By January 1947, the VFPC had acquired all the lands identified in the plan developed some ten years earlier, and the park totaled 2,033 acres. The federal government acquired the remainder of the Walnut Hill property in 1984. (Kurtz 1988: 109; NR 2016, Sec.8: 161,164, as cited in Treese 2003: 126 and Unrau 1985:412)

In late 1949 portions of Walnut Hill's condemned land, as well as some adjacent land, became the site of two impoundment basins (Upper and Lower Basin No. 21) associated with a federal and state dredging effort to clean up the Schuylkill River. By the mid-nineteenth century, the waters of the river were extremely polluted from coal silt and other contaminants washed out of mines upstream in Schuylkill County. By the mid-twentieth century, an estimated 38 million tons of coal waste in the river, popularly known as "the river that runs black," led to massive floods and contaminated drinking water supplies. Silt-laden river water was pumped into the basins and left for several months. Over time, the anthracite fines settled to the bottom and the relatively clean water evaporated, was drained off through a waste weir, or seeped into the ground and levees, leaving behind the coal silt. These resources may possess significance at the state level, but they were constructed outside the period of significance for the Valley Forge NHP district and are part of a much larger system that would be treated more appropriately under separate National Register documentation. (NR 2016, Sec.8: 167)

Commemoration:
Walnut Hill is significant at the national level in the area of Commemoration for significant commemorative resources that form a prominent feature on the Valley Forge park landscape, which represent the

prevailing American ideas of the late nineteenth and early twentieth century concerning the commemoration and interpretation of people, events, and properties associated with American Colonial and Revolutionary War history. While the development of the park at Valley Forge was clearly a state undertaking, the VFPC anticipated that its national appeal would encourage the other colonial states to erect monuments to commemorate their troops present at the encampment. (NR 2016, Sec.8: 168)

Although most memorials are located elsewhere in the park, one is located in the Walnut Hill component landscape and is associated with the efforts of local historical and patriotic societies that contributed memorial markers to the state park in the early twentieth century. In 1901, an essayist in Harper's Weekly had expressed the hope that “a monument correspondingly instructive will mark the place where the Continentals crossed the river on their way to the winter camp [Sullivan's Bridge]. As it is, two stones on the banks of the Schuylkill tell quite modestly the course taken by the troops while crossing.” In 1907, the Montgomery County Historical Society acted on this advice and installed the Sullivan's Bridge Monument, a granite boulder that replaced the earlier markers at the site. (NR 2016, Sec.8: 173, citing Moritzen 1901: 628-629)

Agriculture:
Valley Forge Farms is significant at the local level in the area of Agriculture for the establishment of and improvements to farmsteads that typify the agricultural development of the region. For almost three centuries, agriculture constituted a major land use in the Valley Forge area. The majority of those who settled within the region in the late seventeenth and early eighteenth century were immigrants from Europe, particularly English, Irish, Welsh, Scotch, and Germans. They and their descendants often brought or engaged a work force that ranged from hired, indentured, or tenant laborers to slaves and facilitated the arduous work of establishing viable farmsteads on previously uncultivated land. The region possessed prime soils, plentiful water sources, and convenient transportation routes, making it well suited to cultivation. By 1750, the density of rural settlement was approximately five households per square mile, and farming and agricultural pursuits constituted 80 to 90 percent of the population’s occupations. Over one-half the farmsteads were located within eight miles of a mill or shipping wharf. The road network that existed at the time of the encampment in the Valley Forge area facilitated early European settlement and connected the region with Philadelphia and other local markets (including Lancaster, Reading, and Wilmington). (NR 2016, Sec.8: 208-209)

By the early 1700s, the Pawling family owned a large portion of the fertile peninsula north of the Schuylkill River. During the 1720s and 1730s, Henry Pawling and his son Henry II built a prosperous plantation. Henry Pawling II helped his mother to manage the property after his father's death in 1739 and eventually acquired title to the entire farm, described as “one of the finest [farms] in Pennsylvania.” It is generally believed that the Pawlings established a farmstead, possibly the family’s second, overlooking the Schuylkill River by the 1760s. The north end of the Pawling House is traditionally assigned a construction date of 1745. For the period 1754–1785, Pawling owned seven cattle, four horses, and eighteen sheep. The flood plain area west of the Meadow Grove Springhouse Ruin contains a visible channel or swale that could be related to early use of the area as a drained or watered meadow, a feature included in contemporary descriptions of the Pawling property. To the east of the Pawling farmstead, James Vaux acquired the 300-acre Fatlands Farm in 1772 and made several improvements to the property. The foundations of his ca.1776 mansion house may remain on the site of the current mansion house (located outside the park boundary). Seven cattle, six horses, and 16 sheep were kept on the property for the period 1754–1785, and a 1783 advertisement for the farm mentioned an orchard of 200 trees as well as fenced gardens. Early in the 1777–1778 encampment, a market for the purchase of produce from local farmers was located at the north end of Sullivan’s Bridge, probably on the Vaux property. (NR 2016, Sec.8: 210, citing CLI 2002: 44)

Henry Pawling II began to divide his landholdings between his three children sometime after 1785, while the Fatlands Farm changed hands several times around the turn of the nineteenth century until 1803, when William Bakewell purchased it. In 1825, the Pawling and Vaux/Bakewell farms were consolidated under one owner, Samuel Wetherill, Jr., and subsequently grew into a substantial commercial enterprise. At this time the Meadow Grove and Walnut Hill names were established. The Wetherill family was at the forefront of agricultural innovation in the Valley Forge region at the mid-nineteenth century, the area's “golden age of agriculture.” They continued the tradition established in the late eighteenth century of providing the capital for their farms and relying on hired hands and possibly tenant farmers to work the

land. Samuel Wetherill made several improvements to his farm properties in the 1820s: likely the building represented by the current Meadow Grove spring house ruin in ca.1826; the eastern portion of the estate barn in 1826; the well ruins, and possibly the Estate spring house and privy/storage building. It is difficult to date these features with any accuracy, however, and they may have been constructed during subsequent periods. The earlier Pawling House was expanded and embellished into a Greek Revival-style mansion by the mid-nineteenth century through substantial additions to the south end, which have since been removed due to damage from a 1967 fire. Upon Samuel Wetherill's death in 1829, his widow Rachel received Fatlands Farm; and his five grown children divided the remainder of his property as tenants in common. The estate remained intact and was administered by the executors until Rachel died in 1844, when son John inherited the Walnut Hill portion and William received Meadow Grove and Fatlands Farm. John Wetherill doubled the size of the estate barn in 1845, added a stone corral to its south side. His wife Maria Kane inherited Walnut Hill after his death in 1853, during which time a tenant house and smokehouse were built. (NR 2016, Sec.8: 213-214, citing DCP 1994: 13)

By the close of the nineteenth century, both industrial and agricultural activities in the region declined. The establishment of Valley Forge State Park in 1893 and the subsequent park-related development essentially dominated the area, although scattered construction associated with existing farms and residential neighborhoods occurred in places not part of park lands, including the Walnut Hill component landscape. Maria Wetherill Janeway's widower, the Reverend John Livingston Janeway, continued to occupy Walnut Hill until his death in 1906. Their unmarried daughter Maria K. Janeway appears to have also used it until her death in 1934. Between 1900 and 1929, several features were added to the Walnut Hill landscape: a main entrance road, a stone gate post system, retaining wall, culverted stream, and a spring house retaining wall. The house was sold out of the family in 1949. (NR 2016, Sec.8: 215-217)

Fatlands Farm remained in the Wetherill family until 1946, when Henry E. Wetherill died. William Wetherill sold Meadow Grove in 1919, and the spring house on the property was likely abandoned by the 1920s. Subsequent owners subdivided the farm for residential lots and as a summer resort. Its agricultural character was gradually replaced by groups of cottages and features associated with recreational use of the river, located on private property outside the park boundary. In 1942, the Commonwealth acquired acreage along the river historically associated with the Walnut Hill and Meadow Grove properties as part of a massive project to clean coal silt from the river. The federal government acquired the remainder of the Walnut Hill property in 1984. (NR 2016, Sec.8: 217)

CRITERION C

Architecture:
Walnut Hill is significant at the local level in the area of Architecture for its eighteenth- and nineteenth-century domestic buildings that provide valuable information regarding the regional construction practices and aesthetic trends of the period. The Walnut Hill Estate Barn is architecturally significant for its massive size and ornamental detail, which demonstrate the prosperity of the farm at Walnut Hill. It is currently considered to be the largest historic stone barn in Montgomery County and physically reflects the nineteenth-century shift in agriculture from domestic to commercial scale. The monumental barn of solid fieldstone construction was constructed in 1826 and expanded in 1845. It demonstrates the formalization and enlargement of the Pennsylvania Barn that occurred in the mid-Atlantic region during the early nineteenth century through its 15-bay by 3-bay, three-story massing. The symmetrical side-gable roof, high-drive ramp, and program, with stables on the ground floor and feed storage above, are consistent with Pennsylvania Barn design. During the nineteenth century, the forebay was often incorporated completely within the frame of the barn, allowing for a seamless rear elevation as demonstrated on the Walnut Hill barn. The high-drive ramp, which is exceptionally wide and constructed of stone, is a particularly notable feature of the barn's expensive construction. A carriageway/storage tunnel (since removed) and root cellar under the ramp represent the further expansion of utilitarian space in the barn. Ornamental elements less common on eighteenth-century Pennsylvania barns include window-size openings with stone lintels, round arched openings trimmed with brick, informal quoining on the building corners, and numerous loft doors. (NR 2016, Sec.8: 197)

The Walnut Hill barn is part of a farm complex with other architecturally significant building types, such as the tenant house, privy & storage building, and the estate spring house. The tenant house is a modest Gothic Revival residence with the 3-bay by 2-bay massing and central gable. The privy & storage building

was constructed at a larger scale than is typical of the period, and features stone and brick construction, hip roof, and arid multiple-room plan. Spring houses functioned as part of water supply systems prior to the widespread use of the electric water pump in the early twentieth century and are a regionally prominent historic building type in Pennsylvania. (NR 2016, Sec.8: 197,199)

CRITERION D:

Archeology (Prehistoric):
According to the 2016 National Register documentation, the Valley Forge NHP Historic District is significant at the national level in the area of Historic-Non Aboriginal Archeology for its realized and potential ability to contribute substantive data regarding the form and function of the 1777–1778 winter encampment. The historic district is also significant at the local level in the area of Prehistoric Archeology for its demonstrated and potential ability to contribute substantive data regarding pre-contact-period settlement patterns in the area dating from the Early Archaic through Late Woodland periods. (NR 2016, Sec.8: 117)

Walnut Hill is significant in the area of Prehistoric Archeology for the Fatland Ford Site, as identified in Section 8 of the 2016 National Register. See the Analysis and Evaluation chapter of this CLI and the National Register documentation for more information.

CRITERION CONSIDERATIONS

One of the National Register Criteria Considerations identified for the historic district is applicable at Walnut Hill. Criteria Consideration F (commemorative property) applies because it has achieved historical significance in its own right due to its age, tradition, and symbolic value. The commemorative resources within the district are prominent elements of the encampment landscape and expressions of contemporary thought regarding the commemoration and interpretation of properties associated with American Colonial and Revolutionary War history. (NR 2016, Sec.8: 118)

National Register Significance Criteria:

A - Associated with events significant to broad patterns of our history

C - Embodies distinctive construction, work of master, or high artistic values

D - Has yielded, or is likely to yield, information important to prehistory or history

National Register Criteria Consideration:

F -- A commemorative property

National Register Periods of Significance (with Historic Context Themes):

Time Period: BCE 8000 - CE 1600

Historic Context Theme	Subtheme	Facet	Other Facet
Peopling Places	The Earliest Inhabitants:	The Early Peopling Of North America	

Time Period: CE 1710 - CE 1949

Historic Context Theme	Subtheme	Facet	Other Facet
Creating Social Institutions and Movements	Recreation	General Recreation	
Developing the American Economy	Shipping and Transportation by Water	Canals	
Developing the American Economy	Agriculture	Farming For Local Markets (Dairying, Fruits, And Vegetables)	
Developing the American Economy	Agriculture	Subsistence Agriculture	
Developing the American Economy	Extraction or Mining Industries	Other Metals And Minerals	
Expressing Cultural Values	Architecture	Vernacular Architecture	
Shaping the Political Landscape	The American Revolution	The Declaration Of Independence	
Transforming the Environment	Historic Preservation	Regional Efforts: Mid-Atlantic States, 1860-1900: Memorials To The Revolution;	

Area of Significance:

Area of Significance Category: Agriculture

Area of Significance Subcategory:

Explanatory Narrative:

Area of Significance Category: Archeology

Area of Significance Subcategory: Prehistoric

Explanatory Narrative:

Area of Significance Category: Architecture

Area of Significance Subcategory:

Explanatory Narrative:

Area of Significance Category: Conservation

Area of Significance Subcategory:

Explanatory Narrative:

Area of Significance Category: Military

Area of Significance Subcategory:

Explanatory Narrative:

Area of Significance Category: Other

Area of Significance Subcategory:

Explanatory Narrative: Commemoration

NRIS Information:

NRIS Name:	Valley Forge National Historical Park
NRIS ID:	66000657
Primary Certification Date:	06/18/2016
NRIS Name:	Valley Forge State Park
NRIS ID:	66000657
Primary Certification Date:	10/28/1988
NRIS Name:	Valley Forge State Park
NRIS ID:	66000657
Primary Certification Date:	10/10/1975

State Register Documentation:

Identification Number:	1976RE00002
Name:	Valley Forge National Historical Park

National Historic Landmarks:

National Historic Landmark?	Yes
Theme:	American Revolution, The
Contributing:	Contributing
NHL ID:	66000657
NHL URL:	
Date:	01/20/1961

Statement of Significance for National Historic Landmark:

World Heritage Site:

World Heritage Site?	No
Category:	
WHS ID:	
WHS URL:	
Date:	

Is Resource within a designated National Natural Landscape: No

Chronology and Physical History

Chronology:

Year	Event	Major Event Narrative
BCE 5000	Settled	Archaic period. Bands of migratory peoples generally establish temporary camps in good hunting, fishing, and plant gathering locations, which they revisited periodically or seasonally.
BCE 4000 - 1000	Settled	Late Archaic Period. The previously nomadic peoples begin to form more stable settlement patterns, their populations increase, and trade relationships begin to form between settlements. (Kurtz 1988: 13-14)
CE 900 - 1600	Settled	Late Woodland Period. Cultural practices rely more heavily on native cultigens and planting, and therefore on soils and land that is well suited to farming.
CE 1741	Exploited	European Contact Period. Swedish and Dutch trappers travel the Schuylkill River. The entire Atlantic coast is claimed by England in the mid-17th century, and English begin to emigrate in large numbers. (Kurtz 1988: 17-18)
CE 1681 - 1682	Land Transfer	William Penn receives a charter from King Charles II of England for land in the New World. He purchases additional lands from the Lenni Lenape who are subsequently displaced, and deems the region Pennsylvania—Penn's woodlands. (Sweeny-Justice 1994: 1)
CE 1699	Land Transfer	William Penn sells the 5,000-acre Manor of Gilbert, within which the Walnut Hill component landscape is located, to the London Land Company, a group of land speculators. (Rhoads 1989: 12)
CE 1719	Land Transfer	Edward Farmer, a speculator who had acquired land from the London Land Company, sells a 500 acre parcel along the Schuylkill River to Henry Pawling I who has relocated to the area from New York state. (Kurtz 1988: 20)
CE 1736	Established	A petition is filed to construct a road across the river at the Fatland Ford site, referred to as the "usual ford." (Kurtz 1988: 158)
CE 1739	Land Transfer	Henry Pawling I dies intestate. His son Henry Pawling II acquires the property, which he farms until 1785, when he begins to divide it between his three sons. (Rhoads 1989: 123)
CE 1739 - 1777	Built	Various outbuildings are likely established on the Pawling property, including a barn, springhouse, slave quarters, and additional outbuildings associated with agricultural use of the property. (Kurtz 1988: 74)
CE 1743 - 1769	Built	In ca.1743–1769 the Pawling family may have constructed a dwelling and associated structures on current site of Walnut Hill mansion during mid-eighteenth century. Documentary evidence regarding construction date for dwelling is inconclusive. (Kurtz 1988: 104)
CE 1750	Established	In ca.1750 a ferry crossing of the Schuylkill River is established and maintained by the Pawling family. (Rhoads 1989: 123)

Year	Event	Major Event Narrative
CE 1753	Established	The Pawlings file a petition to establish a road along the current alignment of Pawling's Road. The road is intended to travel from the "water's edge to the road leading from the Iron Works on French Creek to the City of Philadelphia." (Kurtz 1988: 75)
CE 1777	Destroyed	Local residents Nathan Pawling and James Vaux file depredation claims for losses sustained at the hands of the British Army as they pass through the area on their way to Philadelphia in September 1777. (Kurtz 1988: 22)
CE 1777 - 1778	Military Operation	Walnut Hill property is likely utilized by the Continental Army during the encampment. A market site and guard post may have existed near the river, dwellings and outbuildings may have housed commissary officials, goods, and supplies. (Kurtz 1988: 76)
CE 1778	Built	A wooden structure referred to as Sullivan's Bridge is constructed by the Continental Army to facilitate Schuylkill River crossings between the Headquarters area and land to the north, which included the Pawling property. (Kurtz 1988: 22)
CE 1779	Destroyed	Sullivan's Bridge is broken up and carried off by ice flows and high water during the winter following the encampment.
CE 1791	Land Transfer	Henry Pawling II dies, leaving his property to his three sons. Henry III acquires title to what is later known as Walnut Hill; John receives land in the western portion of the peninsula; and Nathan land to the east. (Kurtz 1988: 24; Rhoads 1989: 123-124)
CE 1792 - 1798	Rehabilitated	In ca.1792–1798, the Pawling dwelling on the Walnut Hill site may have been renovated during the latter part of the eighteenth century. These renovations may have eliminated a portion of an earlier structure. (McGimsey 1992: 65)
CE 1800 - 1836	Built	In ca.1800–1836 a spring house is built at Walnut Hill. It is possible that the new structure replaces an earlier spring house structure. By this time, the property also includes a barn, and two other houses. (HSI; McGimsey 1992: 17)
CE 1804	Homesteaded	A visitor to Fatland Farm describes a structure near the river as "a neat little cottage inhabited by a black family to which the former owner of the plantation had given their freedom with the cottage and few acres of land." (Kurtz 1988: 163)
CE 1810	Built	A toll bridge is constructed across the Schuylkill River near the site of Pawling's ferry, replacing it and the use of an existing ford. The structure is later destroyed by a flood. (Kurtz 1988: 27-28)
CE 1813	Purchased/Sold	Samuel Wetherill purchases a portion of the Mill Grove property near the component landscape. (Kurtz 1988: 25; Rhoads 1989: 164)
CE 1820	Built	The toll bridge across the Schuylkill River near the former Pawling's ferry site is rebuilt. (Kurtz 1988: 27-28)

Year	Event	Major Event Narrative
CE 1821	Purchased/Sold	Samuel Wetherill acquires 196 acres of land on the peninsula, to the east of the component landscape, from the Bakewell family. (Kurtz 1988: 25)
CE 1824	Established	The Schuylkill Navigation Company, established in 1815, begins commercial canal operations on the river, constructing a towpath, lock, and dam on the Wetherill and Pawling properties. (Kurtz 1988: 28)
CE 1825	Purchased/Sold	Samuel Wetherill purchases 233 acres in the western portion of the component landscape, formerly owned by John Pawling. Wetherill names the property Meadow Grove. (Kurtz 1988: 25-26).
CE 1826	Built	Samuel Wetherill builds a new stone springhouse on the Meadow Grove property near Pawling's Road. The structure is later enlarged to include living quarters for hired hand(s). (HSI)
CE 1826	Built	Wetherill builds a large, stone, English bank barn on the property. (HSI)
CE 1826	Purchased/Sold	Henry Pawling III, owner of the parcel at the center of the component landscape, dies in 1822. The 157.5-acre property is advertised for sale in 1823 and acquired by Samuel Wetherill in 1826. He names the property Walnut Hill. (Kurtz 1988: 25-26)
CE 1829	Land Transfer	Samuel Wetherill dies, leaving his property on the peninsula to be divided equally between his six children. His wife Rachel administers the properties until her death in 1844. (McGimsey 1992: 19)
CE 1830 - 1880	Built	An outbuilding is constructed in association with the Walnut Hill tenant house. (HSI)
CE 1836	Built	A privy and storage building are constructed on the knoll above the Walnut Hill main house. (HSI)
CE 1836	Built	In ca.1836, brickwork, forming a semi-circular wall, is constructed west of the Walnut Hill spring house, and stone work is used to channelize a brook to the north of the main house. (HSI)
CE 1836	Expanded	The Walnut Hill main house is renovated and greatly enlarged by Wetherill family. (HSI)
CE 1844	Land Transfer	Rachel Wetherill dies. The Wetherill family property is divided between their children. John Price Wetherill acquires Walnut Hill. The mansion may have been utilized as a summer retreat or vacation home during this period. (McGimsey 1992: 20)
CE 1845	Built	A large addition is constructed to the west of the Walnut Hill Barn. It includes a ramp embankment and a large stone corral. (HSI)
CE 1846	Expanded	The Schuylkill Navigation Company expands canal operations on the river, enlarging the dam and lock near Pawling's Ford, and relocating the towpath to the southern bank of the river. (Kurtz 1988: 28)
CE 1853	Land Transfer	John Price Wetherill, owner of Walnut Hill, dies, leaving the estate to his wife, Maria Wetherill. (Kurtz 1988: 26; Rhoads 1989: 108)

Year	Event	Major Event Narrative
CE 1870 - 1880	Built	A tenant house, with Gothic Revival detailing, is constructed on the Walnut Hill property. The house possibly occupies the site of a former tenant dwelling identified in the 1798 Direct Tax as being on the Henry Pawling III property. (HSI)
CE 1877	Land Transfer	Maria Wetherill dies, leaving her property to her children. Her daughter Maria Janeway inherits Walnut Hill. (Rhoads 1989: 109)
CE 1880 - 1889	Engineered	In the 1880s, the Pennsylvania and Schuylkill Valley Railroad constructs a rail line along the eastern margin of the component landscape. It begins operating trains on the line in 1884. (Kurtz 1988: 165)
CE 1890	Land Transfer	Maria Janeway dies, leaving the property to her grandchildren. Her two daughters and her husband are allowed to remain in the house until their deaths. The house is occupied on and off prior to its purchase by the Boulwares in 1949. (McGimsey 1992: 21)
CE 1900 - 1950	Built	In ca.1900–1950 a new retaining wall is constructed near the outflow from the spring house. (HSI)
CE 1900 - 1950	Established	In ca.1900–1950 an entrance drive is constructed from Pawling's Road to the Walnut Hill mansion and barn. Associated developments include stone gate posts at the road and the brook crossing, a retaining wall and stairs near the house, and a culvert over the brook. (HSI)
CE 1907	Memorialized	A monument to mark the site of Sullivan's Bridge is erected by the Historical Society of Montgomery County. This mound-shaped, rough hewn stone monument includes a dressed area on which an inscription is carved. (HSI)
CE 1919 - 1922	Purchased/Sold	William Wetherill sells 166 acres of the Meadow Grove property. This property is later acquired by a real estate developer. (Kurtz 1988: 81)
CE 1927	Platted	Meadow Grove is subdivided to create a residential community—Valley Forge Manor—that will have recreational access to the Schuylkill River. The subdivision is never completed, but various cottages and tent developments are constructed. (Kurtz 1988: 29)
CE 1942	Purchased/Sold	The Commonwealth of Pennsylvania acquires, by condemnation, 42 acres of the former Meadow Grove property along the Schuylkill River as a visual buffer for Valley Forge State Park. (Kurtz 1988: 109)
CE 1942 - 1982	Established	In ca.1942–1982, the Schuylkill River Trail is established between a parking area near Meadow Grove and the Betzwood picnic area. The pedestrian route is later designated a National Recreation Trail. (Kurtz 1988: 83)
CE 1948 - 1950	Purchased/Sold	In ca.1948–1950 the Commonwealth of Pennsylvania acquires additional land near river to establish impoundment basins for removing coal culm from river bottom. River dredging operation requires removal of Pawling's dam and cottages. (Kurtz 1988: 82-83)

Year	Event	Major Event Narrative
CE 1949	Purchased/Sold	Lyle Boulware acquires 57 acres of the Walnut Hill property, including the mansion house, from the heirs of Maria Janeway. (McGimsey 1992: 21)
CE 1950	Expanded	The Walnut Hill mansion is renovated by the Boulwares. (HSI)
CE 1950 - 1960	Rehabilitated	In ca.1950–1960, the tenant house on Walnut Hill property is renovated. (HSI)
CE 1956	Established	The Transcontinental Pipeline Company is permitted to lay a 36” pipeline through the region, including the Walnut Hill property. The right-of-way traverses the impoundment basins.
CE 1967	Destroyed	The Walnut Hill mansion is severely damaged by fire. It is subsequently abandoned by the Boulwares. (HSI)
CE 1968	Rehabilitated	The Walnut Hill spring house is adapted as a dwelling for the Boulwares after the mansion house burns. (Kurtz 1988: 110)
CE 1980 - 1989	Established	In the 1980s, the Philadelphia Electric Company erects transmission towers across the component landscape as part of a new transmission corridor. The construction is preceded by archeological investigation, (Kurtz 1988: 32)
CE 1982	Rehabilitated	The Schuylkill River trail is revitalized between Pawling’s Road and Betzwood, (Unrau 1984: 681-683)
CE 1984	Land Transfer	The Walnut Hill property is acquired from the Boulwares by the federal government. It is to be administered by the National Park Service as part of Valley Forge National Historical Park. (Kurtz 1988: 110)
CE 1985 - 1989	Built	In the late 1980s. The Walnut Hill entrance drive is realigned.
CE 1990 - 1999	Altered	The bridge house at the Walnut Hill Estate Barn is substantially demolished and repaired with modern materials in an effort to stabilize it, leaving only an estimated 20-30% of the original posts, beams, and joists, and 10-15% of the potentially original vertical siding. Contemporary two-by material is substituted to stabilize the remaining sound timbers of the structure. None of the original roof framing survived and the bridge house is roofed with a temporary plywood and felt roof (PEPC 80675)
CE 1992	Rehabilitated	The tenant house on the Walnut Hill property is renovated. (HSI)
CE 1995	Built	In ca.1995, a new bridge is constructed over the Schuylkill River near the original Pawling’s Ford. It has since been removed. (VAFO Natural Resource Specialist Brian Lambert)
CE 2004	Rehabilitated	Trail networks are rehabilitated both within the park as well as on regional connector trails.

Year	Event	Major Event Narrative
CE 2007	Rehabilitated	Several NPS routes or parking lots are rehabilitated, redesigned, or removed to safely accommodate existing and future vehicular traffic, as well as protect park natural and archeological resources at risk from vehicles being parked and driven on sensitive areas due to lack of adequate parking space. In the Walnut Hill area, Route 204 (Pawling parking area) is targeted.
CE 2010	Conserved	Deer management plan is put into effect, using both lethal and non-lethal action to cull the deer herd and alleviate damage to forests caused by extensive deer browse.
CE 2015 - 2020	Removed	In 2025-2020 there is selective demolition of the burned ruins of the mansion house. (Review comments, A. Rhul)
CE 2018 - 2019	Rehabilitated	The Walnut Hill Estate Barn is repaired with work including the selective demolition of the 1990s bridge house material, new shoring and bracing along the north wall of the barn and the south masonry wall of the earthen ramp, repointing of the barn walls, and closing of large openings in the barn walls (PEPC 80675 and 87900).

Physical History:

PREHISTORY TO EUROPEAN SETTLEMENT, 8000 BCE–ca.1700 CE

Overview:
Archeological evidence suggests that the peninsula occupied by the Walnut Hill component landscape has been utilized by humans for thousands of years. Subsurface artifacts identified along the Schuylkill River, primarily near Fatland Island, indicate cultural use and occupation dating from the Early Archaic prehistoric period. As noted by James Kurtz in the (draft) “Archeological Survey and Assessment: North of the Schuylkill River, Valley Forge National Historical Park,” “prehistoric use of the fertile bottom land and plateau in the Fatland Ford Region was extensive.” Although little is specifically known about cultural activities in this region during the Archaic Period, archeologists consider it to have been characterized by a hunter/gatherer society that subsisted on a broad base of game animals, seasonal riverine resources, and plant-based foods. Bands of migratory peoples generally established temporary camps in good hunting, fishing, and plant gathering locations, which they revisited periodically or seasonally. By the Late Archaic Period, ca.4000 to 1000 BCE, the previously nomadic peoples began to form more stable settlement patterns, their populations increased, and trade relationships began to form between settlements. It is believed that cultural practices in the East remained similar through the early Woodland period, although the use of native cultigens as a food source likely increased. The period is otherwise distinguishable due to the introduction of ceramics. (Kurtz 1988: 13-14,156)

Between the Late Woodland Period (ca.900–1600 or 1700) and the Early European Contact Period, settlement sites generally increased in size, although seasonal movement likely also continued. Late Woodland Period cultural practices relied more heavily on native cultigens and planting, and therefore on soils and land that was well suited to farming. It is not known whether any Woodland Period settlements existed within the component landscape. However, previous archeological investigations have uncovered:
“Archaic (Brewerton point) through early Woodland (Marcey Creek pottery) and late prehistoric (Madison point) artifacts (which) document a long temporal use of the site. The pestle fragment indicates food processing at the site and suggests more than short-term occupation.” (Kurtz 1988: 39)

At the time that Europeans first began to arrive in southeastern Pennsylvania, ca.1638, the region was occupied by the Lenni Lenape, an Algonquin-speaking people. It is believed that the Lenni Lenape kept domesticated animals, were in possession of iron and other hard metals, and otherwise used stone tools. The Iroquois, located to the north, briefly conquered the Lenni Lenape or Delaware—as they were referred to by the European immigrants—after gaining the use of firearms, introduced to them by Dutch traders. For much of the remainder of the seventeenth century, these peoples co-existed with early European traders and explorers concerned primarily with trapping beaver for their furs, and other settlers. The Dutch and Swedish were the predominant nationalities represented in the area between 1638, when the Swedes established a fortification on the Delaware, and the 1670s, when the English claimed title to the entire Atlantic Coast. Documents associated with the Holland Company dating from the 1650s indicate that the Dutch had established an extensive beaver pelt trade network by this time, which generally relied on the animals inhabiting the Schuylkill River corridor. The Swedes were more interested in cultivation; they generally settled along the banks of the Schuylkill, establishing small farmsteads. It is not known how the land within the component landscape was utilized by these various groups during the seventeenth century.

In 1681 William Penn received a charter from King Charles II of England for a large tract of land in the New World. Penn augmented his holdings by purchasing additional parcels from the Lenni Lenape near the confluence of the Delaware and Schuylkill Rivers. He deemed the combined area Pennsylvania, or Penn's Woodlands. In 1683, three counties were established within the province. Walnut Hill fell within Philadelphia County. The land to the north of the Schuylkill River where Walnut Hill is located was also known as the Proprietary's Manor of Gilbert, a name given to it by William Penn in honor of his mother's family. In 1699, William Penn sold 5,000 acres of the manor to the Pennsylvania Land Company in London, a group of capitalists that speculated on large tracts of land in the colonies. (Sweeny-Justice 1994: 1; Kurtz 1988: 17-19)

Walnut Hill Landscape:
Natural Features, Spatial Organization, and Land Uses.
During the Archaic prehistoric period, it is thought that environmental changes caused by receding glaciers led to the establishment of the Eastern deciduous forests described by early European explorers. At the same time, the nature of waterways evolved. River estuaries formed, creating new food resources such as shad runs and nuts. The Archaic peoples likely adapted to these changes by altering their diets and their gathering practices. The margins of the Schuylkill River were likely the focus of local Archaic period activities. The shallow water at Fatland Ford, for example, would have been a good site for catching shad.

It is not known whether European settlement of the region had begun by the late seventeenth century. However, the Schuylkill River was likely used for travel, transportation, and as a source of sustenance throughout the European Contact period. As early as 1683, the first of many acts were passed to prevent the navigable waters from being obstructed by dams, racks, weirs and other impediments established by local peoples in support of fishing, indicating the importance of the waterway on many levels.

Circulation.
Little is known about trails or other overland routes that may have existed in the region during this period. The river shallows at Fatland Island and near Meadow Grove appear to have been known to early settlers of the region, and may have been utilized during prehistoric periods either for circulation or for fishing. Trails may have led to these ford sites. Otherwise, the Schuylkill River would have been an important route of travel for both prehistoric peoples and early European settlers.

Buildings and Structures.
Nothing is known about any buildings or structures that may have existed in the area prior to the 1700s.

Vegetation.
The eastern deciduous forest that was first described by early visitors and settlers of the Atlantic Coast region of America is thought to have dominated much of the Walnut Hill landscape until the 1600s, "except where settlement, flooding and fire kept the landscape open." Comprised by

deciduous woodland species such as oaks and hickories on the uplands and mesic and hydric species such as maples, elms, ashes, and sycamores in the lower lying areas, this forest was likely a highly layered and dense plant community that supported a variety of wildlife. The prehistoric peoples who occupied the landscape prior to European Contact are thought to have manipulated the understory of the forest to enhance hunting practices, and may also have cultivated crops after clearing tree cover. Little is known about specific vegetation composition, or adaptations undertaken by the Lenni Lenape, within the Walnut Hill component landscape during this period. (DCP 1994: 20)

EUROPEAN SETTLEMENT AND PAWLING FAMILY OWNERSHIP, 1700–1777

Overview:
By 1700, the region that encompassed the Walnut Hill component landscape had been acquired by the Pennsylvania Land Company of London. The company was comprised of a group of land speculators who were interested in selling off portions of their holdings to other land speculators, and lease-holding other portions in order to generate income while retaining ownership.

In 1719, land speculator Edward Farmer sold a 500-acre parcel on the western part of the Perkiomen peninsula to Henry Pawling I, who intended to relocate to the area from Marbletown, New York. During the 1720s and 1730s, Henry Pawling and his son Henry II built a prosperous plantation on the property that included 8 enslaved people. There were also 31 sheep, 24 cattle, 78 horses, 14 pigs, and a variety of stored grains at the time of Henry Pawling I's death in 1739. Little is known about the character or location of the family's farmstead in the early mid-eighteenth century. It appears likely that Pawling had constructed a dwelling on his property by 1736, when one is mentioned in a petition for a new road across his land. The farmstead might also have included quarters for the enslaved, a barn, additional outbuildings, a kitchen garden, fenced fields, pastureland, access and farm roads, a well, springhouse, or cistern, and an orchard. The site of the Pawling farmstead is not currently known. However, since Pawling owned land beyond Valley Forge National Historical Park boundaries, it is possible that the farmstead was located outside of the component landscape. In addition to his agricultural activities, Henry Pawling I is known to have been an early member of the Anglican St. James Church in Evansburg, Pennsylvania, a small village located along Perkiomen Creek near the farmstead of Henry's brother John Pawling. (McGimsey 1992: 8)

Henry Pawling II helped his mother to manage the property after his father's death in 1739. Eventually, Henry Pawling II acquired title to the entire farm property on the peninsula. Pawling married in 1740, and continued to live on the property and to farm it, with the help of his children, until his death in 1791. He increased his holdings in the area, purchasing 192 acres from Edward Farmer in 1740, and 70 acres from Thomas Lewis in 1748; both of these parcels were located to the east of the original 500-acre Pawling property.

Henry Pawling II appears in numerous transaction records in local mill ledgers between 1757 and 1763. Many of these records involve wheat sales. The family's agricultural activities appear to have prospered during the eighteenth century, due in part to the peninsula's fertile soils, gently sloping uplands, and good supply of fresh water. The Pawling property was at one time described as "one of the finest [farms] in Pennsylvania." Over time, this fertile peninsula came to be known as the "fatlands of Egypt," and one of the plantations established near Henry Pawling's plantation was later named "Fatland Farm."

In addition to their farming activities, the family appears to have established a ferry across the river near the current site of the Pawling's Road bridge during the 1750s. The ferry was established to facilitate river crossings along the road between the French Creek iron works to the west and Philadelphia to the southeast. The ferry partially replaced a ford that existed nearby, described in the 1760s as "a very old ford...beginning with the early settlement of this section of the country." It "was a convenient crossing of the Schuylkill River for travelers making their way from western Chester County to Ridge Pike and Germantown Pike." (Kurtz 1988: 74; McGimsey 1992: 12)

It is not known where Henry Pawling II resided, and little is known about the development of a farmstead on the Pawling property during the first half of the eighteenth century. While it is likely that Henry Pawling I constructed at least a modest log dwelling in the 1730s when he first settled here, no documentary records have been identified to corroborate this theory, and the potential location of a dwelling complex has never been suggested. It is generally believed that the Pawlings had established a farmstead, possibly the family's second, overlooking the Schuylkill River and the ford site by the 1760s. Between 1757 and 1761, the Pawling name appears in the records of the Mount Joy forge operation located to the south along Valley Creek. The entries include records for hauling logs, acquisition of a large number of nails and bushels of lime, lathe, iron, and smith work—purchases relating to the possible construction of a dwelling on the Pawling property. Much of

this farmstead was probably located to the east and north of land currently included within the boundaries of Valley Forge National Historical Park. None of the structures associated with this Pawling farmstead
survive, with the possible exception of a portion of the Meadow Grove spring house. However, archeological evidence of this farmstead is likely located on lands adjacent to the park. This part of the property was called Meadow Grove by Samuel Wetherill in the 1820s, and is frequently referred to by this name within this study.

Henry Pawling II was heavily involved in local civic issues during the middle eighteenth century. During the 1750s and into the 1760s, he served as a justice of the peace member of the Court of Common Pleas for Philadelphia County. In 1747, he was elected captain of a company of associators, and in 1754 to the State Assembly. In 1761, Henry Pawling II was appointed one of the Commissioners charged with upholding a Schuylkill River navigation act that was intended to maintain the river free of impediments to boat travel, and to preserve the ability of the river's fish—shad, herring, and rockfish—to ascend annually to spawn. Pawling was appointed to the commission to ensure the protection of ferry service across the river in 1766, based on his experience operating a ferry near his home.

A second dwelling and farmstead may have been built on the property by the Pawling family during the mid- to late-eighteenth century to accommodate Henry Pawling II's son Henry Pawling III. Although the original house on the Walnut Hill property does not reliably appear in period documentation until 1798 Direct Tax records, it remains possible that the house was built prior to the Revolutionary War. Previous investigation of existing building fabric by historical architects suggests that the home could have been built around the time of Pawling's marriage in 1769, while the 2014 National Register documentation dates it to ca.1745. Located to the east of the Meadow Grove farmstead, the home occupies a prominent knoll overlooking the Schuylkill River, well supplied with strongly-flowing springs. The name Walnut Hill will be used frequently in this text to refer to the property. The name was first used in the 1820s by owner Samuel Wetherill.

Walnut Hill Landscape:
Natural Features, Spatial Organization, Land Uses, and Vegetation.
When the first European settlers arrived in the area, cultivation of crops would necessarily have been preceded by the clearing of forest cover, unless this task had been accomplished previously by Indigenous peoples. Over the course of the eighteenth century, it is likely that "much of the floodplain and river terrace was cleared. Until the Encampment, steeper slopes and water courses often remained forested. Orchards and woodlots were located on most farmsteads and many fence lines were marked by trees or hedgerows." (DCP 1994: 20)

The Walnut Hill component landscape is underlain by Triassic red shale that is suitable for most crops. Wheat was the primary cash crop during the eighteenth century, but other grains, such as corn, buckwheat, hay, oats, and rye, and vegetables were typically grown. Woodlots, which provided wood for fuel, construction materials, and forage for livestock, occupied approximately one-third of the total acreage of a farm at any time. Because they served as a component of crop rotation, namely abandonment of exhausted cropland, their locations often changed over time.

The 500-plus-acre farmstead established by the Pawling family was considerably larger than the typical 189-acre farm in the region at the time. Little is known about the configuration of the property as developed by the Pawling family. However, farms during this period typically were divided into small fields, one to ten acres in size, bordered by chestnut rail fences. Hedgerows typically existed at property boundaries and in areas where changes of land management occurred. Cultivated fields were sited on the well-drained upland areas, and meadows used to pasture livestock and for hay cultivation usually occupied floodplains and areas of less fertile soils. Woodlots occurred on steeply sloped and rocky areas and on marginal or exhausted soils.

Circulation.
Due to a lack of primary roads, the Schuylkill River continued to play an important role in area transportation during this period. Two public roads were established through the area during the eighteenth century, including what is now known as Pawling's Road, and a road running north/south

between Fatland Ford and a mill located on Perkiomen Creek. The date of establishment of the first is not currently known, although the ford used by the road was known to the area's earliest settlers. In the 1750s, the Pawlings established a ferry near the site of the existing ford. There was also, therefore, likely a boat landing located somewhere in the vicinity during this period. The second road, which was an extension of Baptist Road to the south, was established based on a 1736 petition. It led to Fatland Ford, another river shallows that had been "used by the early settlers of the Colony as a safe and convenient place to cross the Schuylkill River." A trace of this route is still visible in the landscape to the south of Route 422. It ran southeast from Pawling's Road, and northward to a mill. Halfway to Fatland Island, the road turned due south, crossed a river channel between Walnut Hill and Fatland Island that no longer exists, and led west across the island before fording the river. A portion of the road formed the property boundary between the Pawling property to the west and land owned by Henry Pawling II's brother-in-law James Morgan, and later James Vaux, to the east. Within the Pawling property itself there likely existed a network of access roads and farm lanes. No documentation, however, has been identified that indicates the character or Pawling plantation circulation. (Kurtz 1988: 158)

Buildings and Structures.
One, and possibly two farmsteads appear to have been established within the component landscape during this period. The farmstead at Meadow Grove may have evolved over a number of years. Henry Pawling I may have erected a simple log dwelling during early settlement, which was replaced by a more substantial complex by son Henry Pawling II after 1757. The complex is thought to have included a dwelling, slave quarters, and agricultural outbuildings. The only portion of this complex that potentially existed within component landscape boundaries may have been a structure on or near the site of the existing Meadow Grove springhouse. Although the location of the farmstead complex is not currently known, mapping associated with the archeological investigations summarized in the Kurtz study suggests that it may have been located to the east of existing Washington Boulevard and to the south of Pawling's Road. It is likely that the farmstead was built in close proximity to the river, but high enough above the floodplain to escape the generally wet and boggy soils adjacent to the river and the high water levels generally associated with spring flooding. Other buildings and structures may have included a landing or dock at the Pawling's ferry site.

A second complex, as noted earlier, may have been established ca.1745–1769 on the current site of the Walnut Hill (Pawling) mansion. Building analysis of the structural remains of the earliest fabric of the existing Walnut Hill mansion suggest that eighteenth century construction occurred in one effort prior to the end of the century. The ruins of a round, stone-lined well located to the southeast of the existing dwelling marks the site of a landscape feature that may have been erected in conjunction with the construction of the eighteenth-century Pawling farmstead.

ENCAMPMENT OF THE CONTINENTAL ARMY, 1777–1778

Overview:
At the time of the Continental Army's encampment across the Schuylkill River at Valley Forge, the Pawling family owned the majority of the land within the Walnut Hill component landscape. By this time, the Pawlings are thought to have established at least one dwelling complex near the river overlooking the site known as Pawling's Ford where they operated a ferry, and possibly a second one on the site of the current Walnut Hill (Pawling) mansion. James Vaux owned the adjacent property, and the road to Fatland Ford served as the boundary between these two properties. The British Army is known to have passed through Valley Forge on September 23, 1777, on route to occupying Philadelphia during the winter and spring of 1777–1778. They crossed the Schuylkill at Fatland Ford, heading north along the road between the Pawling and Vaux properties. Both Nathan Pawling, who likely resided to the west of the road, and James Vaux to the east, filed depredation claims based on the damage caused by the British as they left the area.

In December 1777, with the British Army entrenched in Philadelphia, General George Washington was forced to begin looking for a winter encampment site for the Continental Army. The selection of an appropriate location for housing the army, which he hoped to hold together through the winter, was not an easy process;
"the encampment had to be far enough from Philadelphia to preclude successful British surprise attacks. But the farther west the army moved, the more of Pennsylvania would be exposed to British foraging. According to some accounts, Pennsylvania's governing authority (the Supreme Executive Council) threatened that if Washington moved farther than twenty-five miles from Philadelphia it would be compelled to withdraw its vital logistical support and even remove the Pennsylvania troops, amounting to three of Washington's fifteen infantry brigades and about a fourth of his artillery and cavalry strength ... Valley Forge offered some answers. Some eighteen miles from Philadelphia, it was too far for easy British attack yet close enough for the Americans to interfere with foraging parties from the city. General Louis Duportail, the very capable French volunteer who was Washington's Chief of Engineers, had already found that the ground offered naturally strong defensive possibilities. Shelters could be built, so that no civilian houses need be requisitioned. Also, it was hoped that the rich farmlands of the area would provide food for the men and forage for the animals." (Trussell 1998: 13)

By December 17, Washington had determined that he would establish an encampment for his troops at Valley Forge where they would remain until the 1778 campaign began in the spring. On the morning of December 19, the men of the Continental Army left their temporary camp at Gulph Mills for Valley Forge, five or six miles distant.

It is likely that area residents and farms located for miles in all directions were affected by the presence of 11,000 troops encamped at Valley Forge over the next six months. Review of documentation dating from the encampment period, however, provides little insight into the role that Walnut Hill played in supporting the troops and activities across the river. A (draft) Development Concept Plan (DCP) prepared by the National Park Service for park land north of the river suggests that the Pawling property may have been "used for some commissary activities, a sentry station and temporary bivouac sites." Although it is extremely difficult to pinpoint specific operations of the army during the encampment from known documentary sources, many have theorized that "many of the farms, barns, fields and food processing structures throughout the entire area were used to house livestock, store fodder or other supplies and dress meat for the soldiers in the encampment." (DCP 1994: 3)

Interpretation of various letters dating from winter 1777 through spring 1778 indicate that commissary officials were quartered on the Pawling property, a mill operated by the family likely supplied flour and possibly lumber to the encampment, and that a market was established at the northern terminus of a bridge—known as Sullivan's Bridge—constructed by the army across the Schuylkill. Soldiers are known to have visited the property to attend the market, and to escape life in the camp:
"'across the Schuylkill lay a pleasant country abounding in provender in spite of all the foraging of both armies during the past autumn. Once over the bridge...a soldier, or an officer, could lead a far

more cheerful life.' This led to the March 3, 1778, order for the immediate construction of a guardhouse at Sullivan's Bridge and a ban on unauthorized camp leave." (DCP 1994: 13)

Period letters suggest that a guard house was constructed at Sullivan's Bridge to monitor and prevent soldiers from these unauthorized visits to the Pawling property. The market was relocated in spring 1778 to the southern side of the bridge to keep order by preventing the soldiers from straying from camp.

While the role the Pawling property played in encampment commissary activities remains debatable, encampment period letters do mention a connection between the site and commissary officers. For example, on February 22, 1778, Ephraim Blaine, Deputy Commissary General of Purchases, wrote to one of his assistants from Pawling's Ford requesting him to take "two Rooms in old Mr. Pawlings and so soon as the Bridge is finish'd move there." It is unclear from the address "Pawling's Ford" whether Blaine was stationed at the Pawling residence near the ford, or to the west across the river, since the letter does not indicate which side of the river or ford he was on. Correspondence headlined later from old Mr. Pawling's have never been discovered, so it is not clear whether the commissary agents ever utilized a Pawling residence during the encampment. However, the connection between Sullivan's Bridge and a dwelling in the letter lends some credence to the theory that there may have been a residence at Walnut Hill at this time. Use of the peninsula as a commissary/ magazine would have required that all extant structures be utilized to store goods and materials and that the commissary agents be stationed on the peninsula. The logistical difficulties in regularly transporting goods across the river and the less defensible nature of the peninsula are arguments against the theory that the component landscape served as part of the encampment commissary. As noted by park historian Lee Boyle, "It may be that the Pawling property was briefly a storage magazine but the problems with getting supplies across the river led to its abandonment." ("The Commissary and the North Side," DCP 1994: 13)

The only references to food supplies on the Pawling property arise from letters written by Thomas Jones, a commissary officer, and others:
"Steenbergen suffer.d his men to go 3 Days without flour & never made Application as he had no Waggons & when he got them afterw. ds the flour this side of the river was all gone we had 242 barrels over at Pawlings But there was no getting it accross their Waggons could not cross." (McGimsey 1992: 62)

"On January 26, 1778, Nathan Pawling sold 5 barrels of flour to the Army, and on February 12, 1778, Henry Pawling sold 574 weight of beef." (McGimsey 1992: 63)

On June 15, 1778, it is noted in the records of the General Orders issued from Headquarters that "The Auditor's Office is removed to Mr. Pawling's the other side Schuylkill near the Bridge." (McGimsey 1992: 63)

Although it sounds like a large quantity, the 242 barrels of flour "over at Pawling's," constitutes only a three day supply based on the estimate of the army's needs prepared by commissary official Thomas Wharton in December 1777. Transport of this flour across the river was difficult, indicating the pressing need for the construction of Sullivan's Bridge.

Despite the lack of evidence that the property served as a commissary site, it is likely, however, that Walnut Hill served as an important grazing area for the Army's transport horses based on the following Orders for Conway's Brigade on June 1, 1778:
"Brigade Orders: As it is Uncertain when the Weather will permit the Army to Move, and very Necessary to have the Waggon as well as other Horses of the Brigade Kept as Much to pasture as is Consistent for the present, the Waggoners are daily to Collect themselves & horses together at 9 Oclock in the Morning and one them Apply for a pass for the Whole to Cross the Bridge or River or River [sic] to pasture, and are to Return with all their Horses Every Evening before Sunsett, and in Case of an Alarm or Orders to March between Nine in the Morng & [writer's blank] in the Evening, the Waggon Master is Immediately to See that the Horses are Brought over & Guar'd, and that Every Article belonging to the Waggons be Kept in Readiness & Good order."

"Divisions: Major Genl DeKalb. Brigades: BG Patterson, B G Learned. Forage Masters: William Rhea, Simeon Lord, Number of waggons and Riding Horses: 40. Fields and Meadows alloted: Mr. Pawling 18 acres wheat, a qrs of rye to be fenced off 34 meadow." (McGimsey 1992: 63)

If nothing else, the strategic position of the property directly across the river from the encampment, the use of Fatland Ford, and the construction of Sullivan's Bridge nearby to facilitate troop movements, delivery of stores, posting of sentries and guards, use of the fields to pasture the army's horses, and other military activities meant that the Walnut Hill site was integral to the encampment. Preliminary archeological investigation of the encampment era activities on the peninsula has identified a cluster of sites on the property along the eastern boundary—the least naturally-defensible border—where Continental Army guards may have been stationed during the encampment to protect against attack from this direction.

It is also relatively certain that the army maintained a market to the north of the river at least for a short period of time, although the location of the market has never been identified. Period documentation indicates that on February 8, 1778, General George Washington ordered markets be established in three locations along the perimeter of the encampment where local farmers and citizens could sell their products to the army. His proclamation regarding these markets states that: "Tomorrow being the day appointed for opening the Market at the Stone-Chimney Picquet, the Army are desired to take notice of the same. Markets will be held at the same place every Monday and Thursday. One the east side of the Schuylkill near the new bridge every Tuesday and Friday." However, due to the problems that arose when men were allowed to leave camp to visit the market on the east side of the river, Washington felt compelled to order the following on March 15, 1778: "The Market which has been held heretofore on the other side of the Schuylkill is to be held in future on the West Side near the Bridge."

Problems continued, though, as General Varnum noted in a letter to General Lord Stirling later that month:
"Inclosed you'll receive the Report of Yesterday; I should have waited upon your Lordship personally, but am too unwell to be out. Permit me then to mention that great mischiefs are committed respecting the Bridge Market. By Genl. Orders, the Market is to be held this side of the Bridge; But that Order is effectually frustrated by the Officers and Soldiers being allowed to pass out of Camp to purchase. They go over the Bridge, meet the Market People at Distance, and gibe Prices for their Articles above the Rates agreed upon; by this Practice, the Market is intirely forestalled, and Nothing can be purchased; For the Country People will not come into Camp, when they can sell at higher Prices out of it."

Little else is currently known about use of the Walnut Hill landscape during the encampment. When the Continental Army decamped in June 1778, they marched north, after crossing Sullivan's Bridge, across the Walnut Hill component landscape. They generally left behind a landscape denuded of trees and fence rails, and agricultural fields and meadows that had been stripped, trampled, and sullied.

Walnut Hill Landscape:
Natural Features, Spatial Organization, Land Use, and Vegetation.
During this period, agricultural use of the Pawling property was greatly disrupted by the encampment. Woodlands were predominantly cut over to supply timber for construction materials and fuel for the troops. As noted in the 1994 DCP,
"once the Continental Army settled on the south side, most trees had already been cut or were now removed for shelter or firewood—leaving a stark landscape. On the north side several trees still remain that could have escaped the soldier's axes. They include a white oak in the pasture near Walnut Hill, a hackberry just west of the Sullivan Bridge marker, and a sycamore next to the Walnut Hill springhouse." (DCP 1994: 20)

Buildings and Structures.
It is not known for certain whether any buildings or structures existed within the component landscape at the time of the encampment. At least one, and possibly three, Pawling farmsteads were in existence by the third quarter of the eighteenth century. A Pawling farmstead stood along the

Schuylkill River overlooking Pawling's Ford; however, it was likely located beyond current park boundaries. An associated spring house, on the site of the current-day Meadow Grove spring house, may have existed within the component landscape, although there is little documentary evidence to support this theory. A house, and associated outbuildings, may also have stood at this time on the site of the contemporary Walnut Hill (Pawling) mansion ruins, but again, there is little documentary evidence to support this theory (Note: The 1985 HSR indicates that the remaining stone portion of the Pawlings mansion was standing during the encampment). The existence of a third dwelling, that of Henry Pawling II's son Nathan Pawling is suggested by archeological evidence identified to the north and west of Fatland Island, and a depredation claim filed by Pawling after purported mistreatment of the property by the British Army in September 1777. Little is currently known about this potential dwelling site.

The only structure known to have been established in association with the Walnut Hill component landscape by the Continental Army was Sullivan's Bridge. This wooden structure provided an escape route for the army, and a means for communication and access to the north side. It appears to have crossed the river at or near Fatland Island. A wooden guard house was constructed in association with one of the bridge landings. ("The Commissary and the North Side," DCP 1994: 7)

Circulation.
The primary roads through the area during the period included Pawling's Road, which bisected the peninsula in an east/west direction and terminated at Pawling's Ford, and the extension of Baptist Road, which lead north from Fatland Ford. Secondary roads, consisting of entrance drives, access roads, and farm lanes, likely existed within the Pawling family farmsteads, although little is known about their configuration or character.

The army is known to have constructed a bridge across the river at Fatland Island to facilitate river crossings associated with the transport of men and goods made substantially more difficult by having to pass through the water. On December 22, 1777, General George Washington ordered that a bridge be constructed across the river under the direction of Maj. Gen. John Sullivan, an engineer. It was a difficult process,
"hampered by bad weather, the shortage of materials and tools, and the competition with the other commanders—trying to finish the huts—for the more skilled carpenters ... Lacking iron spikes, the builders had used pegs to hold the flooring to the stringers. The bottom of the bridge was only six feet above the water's surface." (Trussell 1998: 31)

After its completion in late February 1778, the bridge quickly became an integral component of the encampment, and was utilized frequently to great advantage. Although it was constructed of heavy timbers, the bridge did not last more than one year. Ice flows and spring freshets contributed to its quick demise. No evidence of the bridge remains above ground, and its actual location has been variously reported over the years. Future archeological investigations may help to locate the former bridge site.

RE-INTEGRATION OF THE FARMING COMMUNITY AND PAWLING FAMILY OWNERSHIP, 1778–1813

Overview:
The only documentary evidence of Pawling family losses suffered due to the events of the Revolutionary War are the depredation claims filed by Nathan Pawling, in the amount of 24 L, and by Isaac Pawling, located beyond the component landscape boundary, in the amount of 57 L. Little is known about the effort that was necessary for the Pawling family to rebuild their farms after the war, or how changed the landscape was after the departure of the Continental Army on June 19, 1778. Based on the records of the 1798 Direct Tax and other local records, the Pawlings appear to have quickly recovered their status as successful farmers and civil leaders.

Members of the Pawling family continued to be active in local and regional civic affairs after the Revolutionary War. In 1784, Henry Pawling II was named a County Commissioner to help lay out the newly conceived Montgomery County, which was to be divided from Philadelphia County, and to locate the county seat and buildings in nearby Norriton (now Norristown). His son, Henry Pawling III, was appointed an Associate Judge of Courts in 1789, and was one of the founders of the Norristown Library in 1796.

Henry Pawling II began to divide his property between his three children sometime after 1785, a process which was completed after his death in 1791. Son John acquired parcels associated with the Meadow Grove portion of the property. These holdings included 166 acres that he had purchased from his father in 1785, and 48 additional acres he received later. Tax records indicate that John Pawling may have begun living on the property as early 1776. He continued to reside there until his death in 1825. In 1798, the records associated with the US Direct Tax indicate that he owned 199 acres, and a stone house, barn, and spring house. An advertisement associated with the sale of the property in 1825 lists these same structures, and includes a description of an orchard on the property. The majority of these features appear to have been located outside of current Valley Forge National Historical Park boundaries, although the orchard and spring house likely existed on or near the site of the existing Meadow Grove spring house.

Henry Pawling III, as noted above, acquired title to the property later referred to as Walnut Hill in 1791, although, again, earlier tax records indicate that he may have begun living on the property prior to owning it. He is known to have maintained a farm at the Walnut Hill site until the 1820s that likely included fields, woodlots, a dwelling, and other outbuildings.

Son Nathan Pawling received a 100-acre parcel, which augmented other acreage he had already acquired by deed. Nathan Pawling's land lay adjacent to Fatland Ford and was essentially equivalent to the land acquired by his father in the 1740s. Little is known about the character of this property or what occurred there. Nearby, in 1789, John James Audubon's father purchased the nearby 285-acre Mill Grove property at the mouth of Perkiomen Creek, including its grist and saw mill. Audubon later wrote about the property in his renowned book Birds of America. He married the daughter of William Bakewell, owner of the nearby former Vaux property. The Audubons lived at Mill Grove until 1810.

Early settlers typically exploited the resources available to them. As the region became more thickly settled, and prime agricultural land more scarce, the benefit of being able to work the same fields over and over rather than abandoning exhausted fields and clearing additional acreage was appreciated.

Henry Pawling II's death in 1791 coincided with a great transitional period in agriculture. Scientific practices that aimed to conserve and improve the soil were developed and promoted at this time, including crop rotation, liming of fields, application of manure as a fertilizer and a soil structure enhancement, cultivation of crops such as red clover that could fix nitrogen, and the establishment of integrated outbuildings that promoted efficiency. The productivity of local farming operations increased dramatically after the end of the eighteenth century. Under Samuel Wetherill during the next period, these ideas would locally come to fruition.

Walnut Hill Landscape:
Natural Features, Spatial Organization, Land Use, and Vegetation.
Little is known about modifications made to existing field patterns, circulation systems, or vegetation during this period. The Pawling family farmsteads likely continued to include open fields on the uplands edged by hedgerows or fencing, meadows in floodplain areas that would have been used to pasture livestock, and woodlots. Spring sites, thought to have been numerous in the vicinity of both dwelling complexes, would have continued to serve as an important source of potable water. Many were adapted for cultural use through the establishment of storage basins and protective structures, such as spring houses.

Circulation.
The primary roads described earlier—Pawling's Road and the road to Fatland Ford—appear to have continued in use during this period. Sullivan's Bridge near Fatland Ford was lost to high water in 1779, but was not rebuilt. In 1810, a toll bridge was constructed across the Schuylkill River near the site of Pawling's Ford, replacing the ferry and the use of the ford. Flooding of the river lead to the destruction of the structure in 1820. It was soon rebuilt. Little is known about the configuration of access and farm roads associated with Pawling family farmsteads during the period.

Buildings and Structures.
Both the Meadow Grove and Walnut Hill farmsteads appear to have included various buildings and structures during this period relating to dwelling and agricultural use of the properties. Although its original construction date is not clearly documented, the Pawling farmstead on the Walnut Hill property was listed as a large dwelling in 1798 US Direct Tax records. The building was described as a two-story stone house measuring 45 feet by 32 feet, containing six windows with twenty-four panes and thirteen windows with fifteen panes. The property listing also included a fifteen by fifteen foot spring house, two other houses, and a stone barn, measuring 45 by 30 feet, and was one of the largest assessments in the township. James Kurtz hypothesizes that one of the two other houses listed may have later been incorporated into the present-day tenant house. The other may be the "old stone house" indicated on an 1867 Schuylkill Navigation Company map. Little is known about these features. The springhouse listed on the 1798 Direct Tax may be the original structure established on the site of the current Walnut Hill Estate spring house. Similarly, little is known about the barn structure listed on the Direct Tax in 1798, although it too may have served as the precursor for the barn structure known to have been constructed or substantially renovated during the first part of the nineteenth century by Samuel Wetherill.

Archeological investigation of the area near Fatland Island suggests that a small cottage, possibly inhabited by a freed Black family, may have existed on the lower river terrace near the road to Fatland Island Ford during the early part of the nineteenth century. An 1804 description of Fatland Farm includes mention of a cottage along the river inhabited by a Black family which had been given the land after being freed from slavery. The former location of this cottage has not been identified. Little else is known about the history of this feature.

Henry Pawling III's son William Pawling inherited property to the east of Walnut Hill, outside of current Valley Forge National Historical Park boundaries. William established a stone dwelling, root cellar, barn and corral, and a well. This property also included a road which led southward through the farmstead and cultivated fields toward a meadow area and the river. The property was owned by the Catholic Church but is now owned by the park.

WALNUT HILL AS A PROSPEROUS FARM, WETHERILL FAMILY OWNERSHIP, 1813–1853

Overview:
Samuel Wetherill was an industrial manufacturing capitalist from Philadelphia who first acquired property on the Perkiomen peninsula in 1813. One of Wetherill's business endeavors involved the manufacture of white-lead paint. During the War of 1812, imports of English lead had fallen off; Wetherill appears to have been at least partially interested in the property's potential lead deposits.

As presented in the 1994 DCP, during this period,
"the region became the site of agricultural development and innovation of tremendous magnitude, largely under the impetus of Samuel Wetherill and industrial and manufacturing capital from Philadelphia. Eighteenth century farms were consolidated and magnificent barns and numerous outbuildings were built. Earlier dwellings were extensively modified and enlarged to become stately homes. This was the golden age of agriculture for southeastern Pennsylvania and the era of the 'gentleman farmer.'" (DCP 1994: 13)

The new scientific methods of farming that began to increase productivity and helped the region to transform from,
"subsistence farming to scientific agriculture...included crop rotation, application of lime and manure as fertilizers and soil conditioners, and the cultivation of crops like clover as soil conditioners. As a result, crop yield and acreage in production increased dramatically." (DCP 1994: 28)

One of the earliest properties acquired by Samuel Wetherill on the peninsula is known as Mill Grove. Located outside of the component landscape boundary along Perkiomen Creek, the property included an old mill, which Wetherill reconstructed. Soon thereafter, in 1821, Wetherill acquired 196 additional acres on the peninsula (outside of component landscape boundaries) from the Bakewell family.

In 1825, Wetherill acquired the adjacent 233-acre John Pawling property, which he named Meadow Grove. As noted earlier, the property appears to have already included a dwelling, large bank barn, numerous outbuildings, a spring house, and an orchard by this time. Many of the sites of these former structures remain on parcels that are currently outside of Valley Forge National Historical Park ownership.

Henry Pawling III died in 1822, and his will directed that the Walnut Hill farm be sold upon his death. In 1823, the Walnut Hill property was advertised for sale. The existing house was described as having "four rooms on a floor, with an entry through it." Samuel Wetherill acquired this 157.5-acre farm in 1826 and that same year constructed a new stone barn on the property. At some point between 1826 and his death in 1829, Samuel Wetherill, Jr., named the property Walnut Hill. James Kurtz, in his study of the area, theorizes that he named the property for the walnut trees given to him by Stephen Girard in the 1820s. By the time of his death in 1829, Samuel Wetherill owned most of the peninsula. (McGimsey 1992: 18)

Wetherill's wife Rachel was bequeathed a family house in Philadelphia as well as the Bakewell farm property located to the east along Pawling's Road, later named Fatland Farm. The remainder of his property was equally divided between his six children as tenants in common. Rachel administered the land until her death in 1844. After Rachel Wetherill's death, the Walnut Hill portion of the property passed to their son John, who also purchased a 99-acre parcel nearby from William Pawling. John Price Wetherill died in 1853. His estate at Walnut Hill was bequeathed to his widow Maria Kane Wetherill. Son William Wetherill, Jr. acquired Fatland Farm.

Various improvements were made to the Walnut Hill estate prior to and after Samuel Wetherill's death in 1829. It is likely that the primary dwelling was substantially altered and enlarged to include Greek Revival detailing, columns, a porch, and a portico around 1836, based on a photograph of that date etched onto "a large sheet metal collector box atop one of the rainwater downspouts," although it is thought that other limited alterations may have been made previously by Samuel Wetherill after acquiring the property. (McGimsey 1992: 20)

Samuel's son John Price Wetherill appears to have approximately doubled the size of the stone barn in 1845 by constructing an addition to the west. The two barn structures, very different in their layout, reflected the changes occurring in farming practices during the nineteenth century. The 1826 barn incorporated a new integrated approach to housing livestock and storing their feed—livestock were housed on the basement floor, and the mows, grain bins, and other storage areas for feed were sited above so that the feed could be thrown down to the livestock.

These areas had plenty of ventilation and were accessed by a ramped entrance. The 1845 addition to the barn reflects a transformation of the Walnut Hill farm to a commercial and technological enterprise. The other developments on the property that reflected the changing regional trends in agriculture included the construction of tenant housing, indicating a new reliance on hired labor and possibly tenant management of farms.

It was also during this period that transportation methods improved, providing better connections between local farms and the markets in Philadelphia and elsewhere. As described in more detail below, the Schuylkill River became a major commercial transportation route with the advent of the Schuylkill River Canal in the 1820s. Across the river, a rail line was established in the 1830s. Both systems greatly improved access to markets for the Wetherill family agricultural products.

Walnut Hill Landscape:
Natural Features, Spatial Organization, Land Use, and Vegetation.
The Meadow Grove and Walnut Hill properties continued to be used primarily for agriculture during this period. Open fields, woodlots, hedgerows, stream corridors, wooden and stone fencing, access and farm roads, and clusters of buildings and structures associated with dwelling and farm management were likely the primary features of the landscape at this time. However, the details of their physical configuration are not well documented prior to 1929. As noted in the 1994 DCP, "during the first half of the 19th century, agriculture bloomed in the area. With money from Philadelphia industrial pursuits and new scientific agriculture technologies, materials, and management techniques, production rapidly increased. Most of the remaining forested areas were cleared from the banks of the Perkiomen to the Schuylkill. Occasional large trees surrounded by scrubby growth bordered open fields and followed stream channels and property lines." (DCP 1994: 20)

It is possible that the property enjoyed a limited industrial heritage. Period documentation suggests that Samuel Wetherill purchased land near the mouth of Perkiomen Creek in 1813 for its potential lead deposits. It is thought that he may have excavated lead from a mine on his property prior to 1818. ("History of Montgomery County, Pennsylvania," in Combination Atlas Map of Montgomery County, J.D. Scott, 1877: 16)

Buildings and Structures.
The buildings and structures that existed or were constructed within the component landscape during this period of Wetherill family ownership include the Meadow Grove spring house, and the Walnut Hill dwelling, spring house, barn, barn addition and corral, tenant house or houses, and a privy and storage building.

The Meadow Grove spring house was likely constructed circa 1826 by Samuel Wetherill, according to the List of Classified Structures, or perhaps in the eighteenth century, as reported in the 2016 National Register. It is not known to what extent, if any, an existing Pawling family structure was modified to establish this building. The structure included dwelling space on an upper level for a hired hand. It was likely renovated or augmented between 1830 and 1860, and again during the twentieth century.

After acquiring the property in 1826, Samuel Wetherill appears to have resided at Walnut Hill. Soon thereafter, Wetherill constructed an enormous stone barn near the house, which included a ramp embankment and three levels. Wetherill appears not to have substantially altered the existing house prior to his death in 1829. In 1836, however, family members, including Wetherill's widow Rachel and son John appear to have initiated a major reconstruction of the house, which evolved from a

relatively small farmhouse to a Greek Revival mansion. At around the same time, the family appears to have developed or renovated a stone privy, a spring house near the mansion, and stone structures associated with channelization of Walnut Run. The extant Walnut Hill privy and storage building that was likely constructed during this period is located to the west of the house on a knoll. It is a one-story structure composed of three rooms, with three door openings. The spring house, which may have grown out of an existing, less refined structure, was a two-story structure built into a bank. The lower level housed the spring house, and the upper level was used for various purposes, including as a residence, over the years. Exterior brick work forms outdoor terrace and garden features. This brick work and other features, including culverts and stone-lined channels associated with Walnut Run to the west, appear to have been constructed to control the outflow of the spring and brook that traverses the Walnut Hill estate and crosses beneath the property's driveways and lanes. It is difficult to date these features with any accuracy, however, and they may have been constructed during subsequent periods.

The large barn addition constructed by John Price Wetherill in 1845, was located along the western side of the existing Walnut Hill barn. Wetherill also added a large stone corral, composed of rubble stacked up to five feet high, to the south of the structure, which formed a rectangular yard adjoining the barn. The wall included an opening midway along the southern wall marked by stuccoed gateposts. Once completed, this structure became "the largest stone barn in Montgomery County and...represent (ed) a unique type among Pennsylvania barns—inspired more by the English bank barn tradition rather than the more common German derivations." (DCP 1994: 33)

Elsewhere within the component landscape, the only other structural features thought to have existed during this period include stone walls leading south of the barn towards the river, and along field margins near the Walnut Hill house precinct, and stone retaining walls that likely supported the canal towpath along the Schuylkill River.

Circulation.
The primary roads associated with earlier periods continued to exist within the region, although it is likely that Fatland Ford and Baptist Road fell out of use at some point during the nineteenth century. The Pawling's Road Bridge across the Schuylkill, established in 1810, remained a popular route of travel. In 1820, the bridge was destroyed during a spring freshet, but was quickly rebuilt. Little is known about the alignment and character of Wetherill property roads, drives, and farm access routes during this period.

Use of the river as a means of transportation improved during the 1820s, when a canal was opened between Reading and Philadelphia. It was later expanded to Schuylkill County. The canal was developed to promote commercial interests and river transportation. The Schuylkill Navigation Company, founded in 1815, named commissioners who were empowered to not only "destroy but to prevent the erection of all wears, racks, fish dams, and baskets." For much of the eighteenth and the early nineteenth centuries, commercial use of the river was often in conflict with general transportation and fishing uses. Local individuals and groups were known to have constructed weirs across the river to trap fish. These weirs created hazardous conditions for those attempting to navigate the river. Laws were regularly passed to restrict the use of dams and weirs that would interfere with navigation of the river.

Prior to establishment of the canal, commercial navigation of the Schuylkill River involved the transport of goods, such as flour and grain, and some passengers. Typically, goods and passengers were transported on so-called Reading boats, a type of flat-bottomed vessel that originated from that town. The boats generally floated down river and were poled back up. The downriver trip to Philadelphia took two days; the return trip five or six days, using the labor of four or five men. Once the canal was established, mules could be used to pull barges along the river and through a system of locks associated with the dams that regulated the water level.

By 1826, the canal was substantially complete along its approximately 110-mile length between Fairmount in Philadelphia, and Port Carbon in Schuylkill County. Over the length of the canal system, there were approximately 47 miles of slackwater pools, and 63 miles of watered canal prism. Thirty-four dams fed the 3.5- foot deep canal prism with water. There were approximately six dams

located within Montgomery County. There were 109 locks and one tunnel along the system, which ascended 620 vertical feet. The portion of the river that abuts Walnut Hill was a slackwater section of the canal. Dams were constructed at Catfish Island—downstream from Fatland Ford—and near Pawling's Ford, which raised the river to a navigable level. Locks were integrated into the dams to raise or lower the boats to the level of the adjacent canal section. Pawling's Dam included a large stone retaining wall on the eastern bank of the river, a large stone lock structure on the western bank, and a wooden dam section between. The canal towpath was located on the river's north bank and traversed the Pawling/Wetherill property. A canal company drawing, ca.1827, illustrates the plan of the dam and lock, two stone piers or docks on the southern portion of the Meadow Grove property, and the nature of the topography on the western bank of the river (Figure 1).

Another drawing of the dam and lock survives from the 1860s that indicates how the lock was expanded in 1846 in response to a major increase in the hauling of coal. The towpath, which had been located on the river's northern bank between 1824 and 1846, was relocated to the southern bank of the river at the time, and the towpath below the Wetherill property was abandoned. The number of locks used by the canal was also increased at that time. Evidence of a stone boat landing or dock survives near Meadow Grove. It is possible that the stone structure was associated with the canal system. James Kurtz hypothesizes that this feature may represent a site where the early towpath crossed over the river.

Small-Scale Features.
Commemoration of the Valley Forge encampment of the Continental Army generally began circa 1828 to mark the fiftieth anniversary of the departure of Washington and his men. One of the first physical features erected as part of a growing commemorative movement during the nineteenth century was the establishment in 1840 of a monument to commemorate the Sullivan's Bridge site. It is thought that a small sandstone marker was erected on the southern bank of the river, beyond the limits of the component landscape. The location of this marker is not known today. In 1850, Dr. William Wetherill erected another sandstone marker on the river's northern bank near the purported site of the bridge abutment. It quickly became broken and eroded, and its location is similarly not known. During the next period a third monument is erected to mark the former site of this historic feature. Little else is known about small-scale features associated with the component landscape during this period, although iron fencing survives along the river near Fatland Island that may have originated during this or a later period.

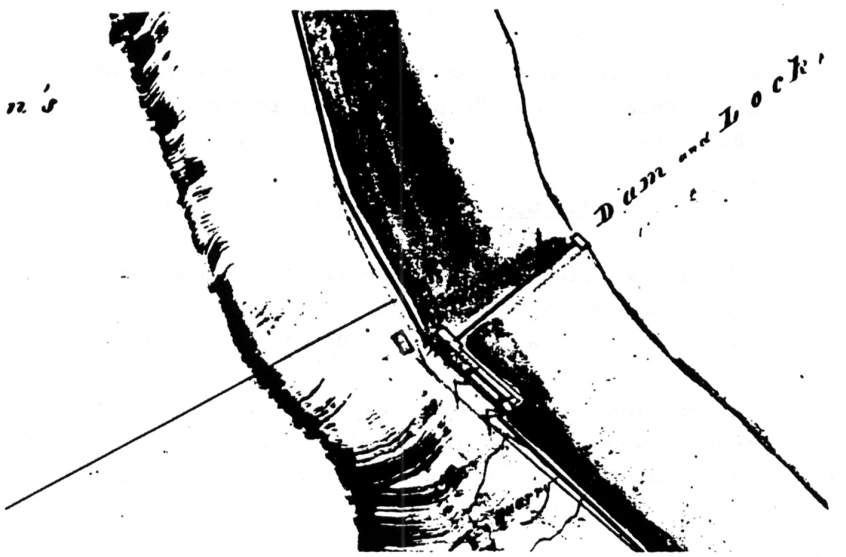


Figure 1: Schuylkill Navigation Company Map (ca. 1827)
Showing Pawling's Dam and Lock (No. 25)

Figure 1. Schuylkill Navigation Company map of Pawlings Dam and Lock (ca.1827).

WALNUT HILL MANAGEMENT BY TENANT FARMERS, 1853–1949

Overview:
In 1853, John Price Wetherill died, and his wife inherited the Walnut Hill property. Some sources suggest that Maria Kane Wetherill ceased living in the mansion after her husband's death, while others indicate that she utilized the house, at least as a summer or vacation dwelling, until her own death in 1877. In either case, it is likely that tenants resided in a tenant house on the property and undertook general management of its agricultural operations during this period. After Maria Wetherill's death, the property was divided among her children, although it was subsequently awarded in toto to daughter, Maria Janeway, in 1878. Janeway, her husband, and their large family likely resided on the property until Maria's death in 1890, apparently undertaking various renovations of the house during the interim. Janeway's husband and children variously occupied the house until the early twentieth century.

By the time a rail line was established through the area in the 1880s, the region had lost its agricultural competitive edge. Much of the agricultural land had been left fallow and people were looking for other uses for their property. The Janeway family appears to have maintained a primary residence elsewhere after the turn of the century. It is likely that the Walnut Hill mansion house sat unoccupied until it was acquired by the Boulwares in 1949. (DCP 1994: 29)

Various maps, atlases, plans, illustrations, and photographs have been located which depict the landscape between the second half of the nineteenth and the first part of the twentieth centuries. Images that portray the Walnut Hill landscape during the nineteenth century include an 1867 field map of the property prepared by the Schuylkill Navigation Company, three Montgomery County atlases, and a nineteenth century painting of the Walnut Hill estate from the Washington's Headquarters area.

The 1867 canal company field map indicates that a cluster of up to eight structures existed in the vicinity of Meadow Grove at the time. Additionally, it shows an "old" stone house and an agricultural

complex at Walnut Hill. Based on review of this map and available tax records, the buildings at Meadow Grove likely included a dwelling, large barn, spring house, carriage and wagon house, and other outbuildings—possibly a frame stable and frame carriage house—adjacent to and south of the existing spring house. The barn is known to have been demolished shortly after World War II and the stone reused to construct a dwelling nearby. The field map does not convey any other landscape information, such as the nature or configuration of vegetation or circulation routes, although it does indicate the presence of hotbeds south of the stone corral at the Walnut Hill barn, a long stone wall extending toward the river, and fences dividing the agricultural lands from the meadows along the river, all of which are no longer extant. (Kurtz 1988: 80)

Montgomery County atlases of Lower Providence Township exist for the years 1871, 1877, and 1893. Each indicates the existence of a road and bridge in a similar alignment to today's Pawling's Road and bridge, Wetherill ownership of the southern half of the peninsula, a dwelling at Meadow Grove, a dwelling and entrance drive at Walnut Hill, and a dwelling and drive at the adjacent William Pawling farmstead. Drainage from the spring at Meadow Grove, and the lower portion of Walnut Run are the only other landscape features that are depicted on the 1871 and 1877 atlases within the component landscape. The 1893 atlas identifies the Janeway family as owners of the Walnut Hill and William Pawling properties at that time. The majority of the landscape features shown on the earlier atlases again appear on the 1893 atlas, with the addition of the recently completed Pennsylvania and Schuylkill Valley Railroad rail line along the eastern margin of the component landscape. Associated developments that existed near the component landscape included Lockwood Station and stone tunnels.

The nineteenth century painting of Walnut Hill from the Washington's Headquarters area reveals much about the features and character of the Walnut Hill landscape at the time (Figure 2). In the image, vegetation in the foreground gives way to a view of the river where a boat is seen quietly traveling downstream. Livestock, primarily cattle, are visible on the far bank grazing on the vegetation of the lower slopes of the riverbank. Trees and shrubs occupy a thin band along the river's edge. Above the river floodplain, additional livestock are visible, which appear to be primarily sheep. The Walnut Hill mansion and a large stone barn are visible in the background. The house is dominated by a large porticoed porch facing toward the river. Shade trees appear to exist in the vicinity of the house, and an orchard or ordered planting occupies the slope below the barn. Much of the middle ground is open and pastoral, and appears to include fencing. While artists tended to romanticize the character of the landscape during this period, and the painting cannot therefore be expected to portray the site in an entirely accurate manner, many of the features shown are consistent with other sources for the period.

There are also a variety of primary source graphic images dating from the twentieth century that illustrate the Walnut Hill landscape, particularly between 1927 and 1930 (Figures 3 and 4). These include maps, aerial photographs, and aerial perspective photographs. One of these is a 1927 subdivision map entitled "Beachfront Section" of "Valley Forge Manor" prepared by Yerger and Burke, Inc., to develop numerous residential lots on the Meadow Grove property. John Yerger, a real estate developer, had acquired a 166-acre portion of Meadow Grove from Karl Thompson, who had purchased the land from William Wetherill in 1919. While the subdivision was never completed as envisioned on the 1927 drawing, a circa 1930 map of the Meadow Grove area exists to indicate that recreational cottage and tent developments, as well a network of primary roads, were constructed on the property in the late 1920s before the stock market crash ended the project. Some of the cottages were located on the former Wetherill orchard site, others to the south along the river. Many were eventually damaged by river flooding. The 1930 plan also shows the Meadow Grove spring house, a barn beyond the component landscape, Pawling's Dam, and Pawling's Bridge (Figure 5). In the early 1940s all of the cottages that remained standing were condemned by the Commonwealth of Pennsylvania as part of a river dredging effort. One, however, is said to have been dismantled and rebuilt along Jug Hollow Road.

A 1929 map exists of the Walnut Hill farm that is quite detailed and provides important information about the property at the time. The existing house and barn appear on the map, as do a tenant house and outbuilding, and a privy structure. The spring house is also shown, with a lane, no longer in use, leading between it and the barn. A brook, fed by four springs, traverses the farm complex.

The map shows an unimproved farm drive, which survives today as a trace road, leading into the property from Pawling's Road to the west, and a more formal drive leading to the mansion from Pawling's Road to east. Woods appear along the road frontage, and meadows along the river. Fenced field divisions dominate the area between the woods and the meadows. The area around the mansion is shown as lawn with fencing at the perimeter. Fencing also encloses a precinct around the tenant house. A chicken yard, orchard, and "little" orchard are shown north of the tenant complex. An additional orchard is shown west of the mansion, with gardens and "grapes" indicated below the barn and its stone corral, and east of the lawn to the south and east of the mansion. A road leads from the barn toward the river. A garage appears to the south of the barn, set into the corral wall (Figure 6). Period aerial photographs depict these same features and give a good indication of the texture and character of the landscape at the time.

One of the most interesting aspects of these photographs is the information they provide about the character of the slopes leading to the river prior to the construction of the impoundment basins (Figure 7). Gradual and pastoral, these slopes were dramatically altered in the late 1940s when the Commonwealth of Pennsylvania constructed two large impounding basins on 42 acres fronting the river. This land, condemned in 1942 to create a visual buffer for Valley Forge State Park is where coal culm dredged from the Schuylkill River was deposited.

Walnut Hill Landscape:
Natural Features, Spatial Organization, and Land Use.
It is during this period that the predominant existing character of the Walnut Hill landscape was likely established. While agriculture remained the dominant land use at Walnut Hill during this period, this began to change during the early part of the twentieth century. As noted in the DCP, "as agriculture dwindled in the closing years of the century, marginal fields were taken out of production and reverted back to woodland. It is likely that the lower pastures on the floodplain were the first to be abandoned, followed by wet areas, and steep slopes." Meadow Grove, for example, was abandoned as a dwelling complex and was subdivided for residential lots. Its agricultural character was gradually replaced by groups of cottages and features associated with recreational use of the Schuylkill River. Canal operations on the river were abandoned, and, with this, the activity level along the water likely diminished. At the same time, the water quality of the river also began to be adversely affected as coal culm moved downstream from anthracite coal processing operations in Schuylkill County. During the late nineteenth century, as noted in the DCP, "water was pumped through the coal piles to remove small particles and returned directly to the river now laden with dust." Between the mid-19th and 20th centuries, silt had choked the river from the coal plants to below Valley Forge and left a three- to four-foot layer over the entire floodplain and reduced the biological activity in the river to less than 20% of its former level. As a result of canal operations, this siltation, and associated changes in water levels, the banks of the river were variously altered over time. During the early 1920s, for example, water ceased flowing through the western channel of the river around Fatland Island (Figure 8). (DCP 1994: 20)

Late nineteenth century construction of the Pennsylvania and Schuylkill Valley Railroad rail line along the northern edge of the site also affected the character, land use, and spatial organization of the Walnut Hill component landscape by dramatically altering local topography, through the filling of drainages and ravines and massive excavation, to accommodate the rail bed.

Later, towards the middle of the twentieth century, the evolution of the state park across the river at Valley Forge began to have an impact on the Walnut Hill property, first on views of the landscape across the river, and subsequently through the state's acquisition by condemnation of portions of the Walnut Hill landscape. The character of the riverfront in particular appears to have changed dramatically during this period. The condemned land along the river was utilized as a recreational trail, and later in an effort to clean up the Schuylkill River sedimentation problem. In 1948–1949, two large impoundment basins were constructed on the floodplain below Walnut Hill to remove the coal dust from the river.
"These were actively used through the early 1950s. After a decade of mining by a reclamation company, most of the coal dust was removed from the lower basin—the upper one was never used. The last reclamation truck left the area in 1982. Both reclamation efforts were very successful and the river had been cleaned up to the extent that this basin system was no longer needed and has

been replanted as pasture." (DCP 1994: 19)

Much of the river's floodplain, however, remains covered in coal culm. Archeological investigations of the area have indicated that culm covers original soil elevations and potential cultural deposits by five or more feet. As part of the river dredging project, Pawling's Dam was removed. This served to lower the river's water to its pre-canal level.

Circulation.
During the 1880s, the Pennsylvania and Schuylkill Valley Railroad constructed a rail line on the plateau running along the eastern edge of the component landscape. This rail line began operating in 1884. While the line is no longer extant, the rail bed, constructed of fill and cinders, is still in evidence adjacent to Route 422 and is used as an access route for park maintenance vehicles and as a trail. Otherwise, canal use of the river, which remained viable through much of the nineteenth century, likely ended by the first quarter of the twentieth century.

At Walnut Hill, various circulation features appear to have been constructed between 1900 and 1950. These include the main entrance drive leading to the mansion from Pawling's Road, the various stone walls and gate posts located along Pawling's Road and at the brook culvert, the retaining wall that edges the driveway to the west of the mansion, and the flight of steps leading to the privy/storage structure.

Buildings and Structures.
At Meadow Grove, the spring house and associated features likely were abandoned by the 1920s. The property was sold to a developer who subdivided it for housing and as a summer resort. Guest cottages and tents were established along the river south of the Meadow Grove spring house. The facilities were utilized by city dwellers who traveled to the area by passenger rail to vacation. The cottages and tents were sited with views to the river. Meadow edged the development to the east. An associated boat landing, dock, and beach areas were constructed along the river, which remained conveniently impounded as part of the canal system.

At Walnut Hill, the spring house, mansion house, and barn continued to exist during this period. The extant Walnut Hill tenant house, a simple, three story, T-shaped dwelling with Gothic Revival detailing, was likely constructed between 1870 and 1880, and renovated during the twentieth century. A one-story brick outbuilding, possibly a smokehouse, located to the east of the tenant house was also built during this period. The stone barn appears to have been converted to a dairy at some point during the twentieth century, and a wooden structure was constructed nearby as a milking equipment room.

Vegetation.
Vegetation on the Walnut Hill property during this period likely included woodland, cultivated fields, hedgerows, orchards, ornamental plantings, and kitchen gardens. During the nineteenth century, the Meadow Grove estate was likely composed of cultivated open fields edged by fencing or hedgerows, woodlots along the steep river terrace embankments, a fruit orchard near the dwelling complex, and possibly gardens. During the twentieth century, these agricultural uses were replaced by a subdivision, which may have incorporated existing open fields and portions of the orchard into the new development.

Walnut Hill vegetation appears to have consistently included open fields on the uplands, a woodlot near Pawling's Road, fruit orchards in the vicinity of the house and tenant house, and gardens around the house and barn. The steep slopes of the river terrace embankment were likely wooded, as indicated in a late nineteenth century painting of the property. The floodplain appears to have served as pasture for livestock, and may have been maintained in a combination of meadow and successional woodland until acquired by the Commonwealth of Pennsylvania after which time woodland became the dominant vegetative cover.

Small-Scale Features.
During this period, there were many efforts made to commemorate the Revolutionary War-era encampment of the Continental Army at Valley Forge. Within the Walnut Hill component landscape,

a stone monument was erected by the Historical Society of Montgomery County in 1907 at the purported site of Sullivan's Bridge. This mound-shaped, rough-hewn, stone monument survives today. It includes a dressed area on which an inscription is carved. Otherwise, some of the small-scale stone and brick work on the property, including the culverts and gate posts associated with Walnut Run and a retaining wall adjacent to the outflow of the Walnut Hill spring house, may have been built during the period.

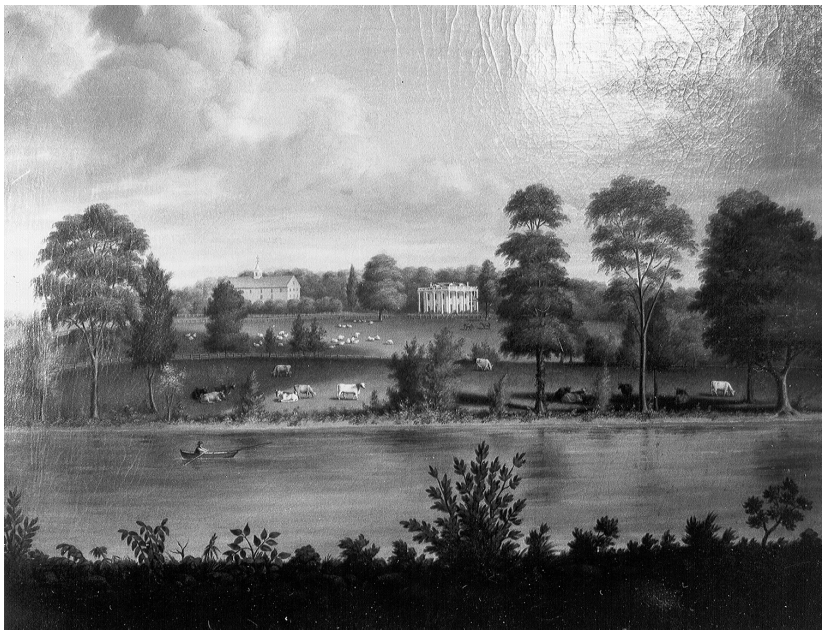


Figure 2. Nineteenth-century painting of Walnut Hill from the Washington's Headquarters area.



Figure 3. Aerial photograph showing the Meadow Grove Estate area and Pawlings Dam (1928).



Figure 4. Aerial photograph of Walnut Hill (1928).

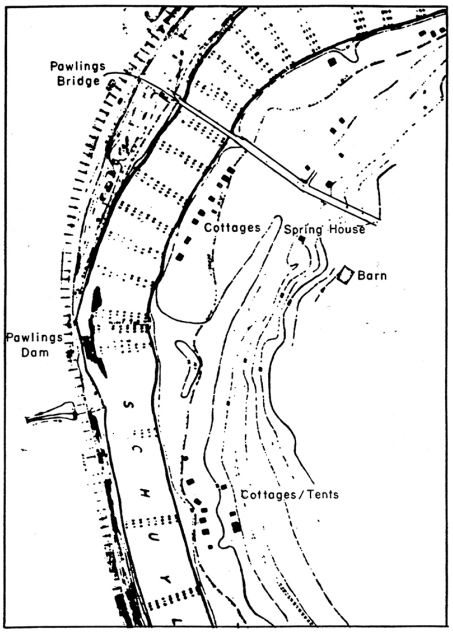


Figure 5. Map of Meadow Grove area showing cottages and tents along Schuylkill River (ca.1930).

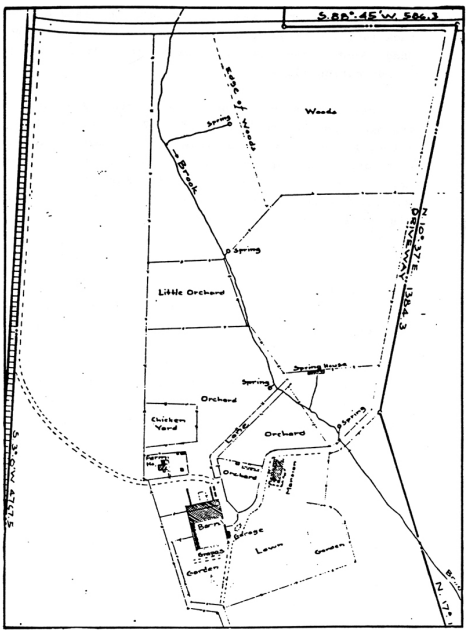


Figure 6. Layout of Walnut Hill Farm (1929).

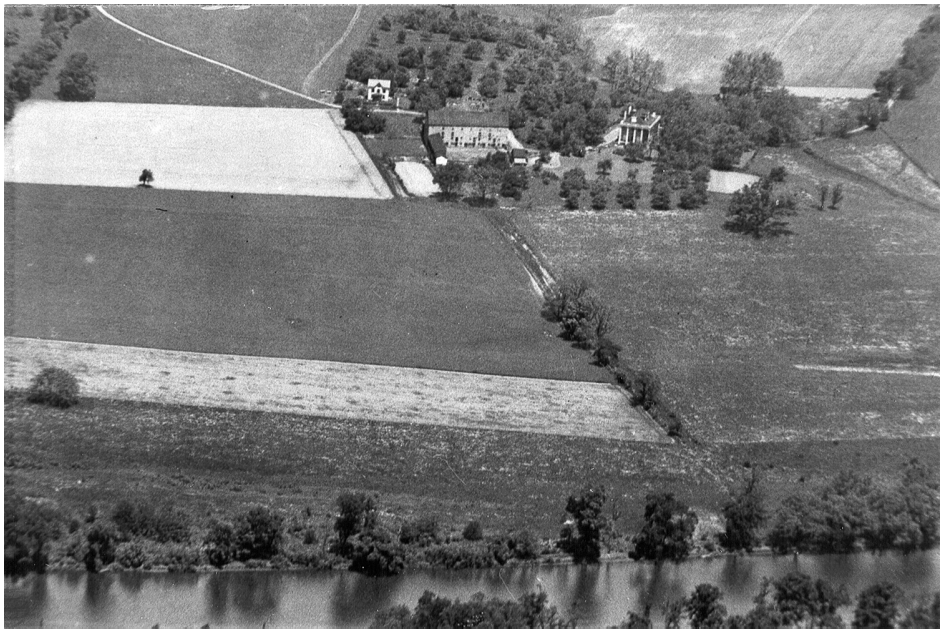


Figure 7. Aerial view of the Walnut Hill farm complex including the mansion, barn, tenant house, fields, orchards, and access roads (1928).



Figure 8. Aerial perspective of Fatland Island with the William Pawlings farmstead in the background (1928).

BOULWARE FAMILY OWNERSHIP, 1949–1984

Overview:
In 1949, the Boulware family acquired 57 acres of the former Wetherill family property at Walnut Hill, including the mansion and surrounding farmstead (Figure 9). They renovated the mansion and added modern utilities. The Boulwares also revived the property as a working farm. A fire gutted the mansion in 1967, however. Rather than renovate the structure again, the Boulwares improved the spring house and relocated there before selling the property to the federal government in 1984.

As noted earlier, by the late 1940s when the Boulwares purchased Walnut Hill, the state had acquired acreage along the river historically associated with the Walnut Hill and Meadow Grove properties as a visual buffer for Valley Forge State Park. On this land, and additional acreage subsequently acquired for the purpose, the state constructed two large impoundment/settling basins as part of a "massive environmental clean-up of coal silt in the Schuylkill River." These two basins, completed by June 1949, were formed through the construction of a mile-long stone and earthen levee and a series of waste weirs. Water and silt dredged from the river were deposited in the basins. After the water drained from the basins, the coal culm could then be extracted and potentially recovered. Only the lower basin was used during the dredging project, which ended in the early 1950s. (Kurtz 1988: 29)

These impoundment basins, which remain within the Walnut Hill component landscape, "represent one of the earliest and largest expenditures of public funds for the correction of environmental damage to the river. Upriver mining of coal had polluted the river to the point where such a project was necessary." During construction of the siltation basins, Pawling's Dam was removed to alleviate on-going river flooding problems. The lock, which survives to the west of the component landscape, was left intact on the south bank of the river. Existing resort cottages were also removed during construction of the basins. Eventually some of the deposited coal silt was removed from the basins. (Kurtz 1988: 51)

During the second half of the twentieth century, state park development began to have an ever-increasing impact on the walnut Hill component landscape. In addition to the impact of views across the river, a recreational trail was also established on state-owned land during this period. It followed the edge of the river between Pawling's Road and Betzwood, and included bridges for crossing deep drainageways and stream corridors, and limited parking.

Later, the National Bicentennial of 1976 heralded many changes at Valley Forge State Park. On July 4, 1976, President Gerald Ford visited Valley Forge State Park. During a sunrise service, he greeted a Bicentennial Wagon Train as it arrived at the park, after which he signed legislation authorizing the establishment of Valley Forge National Historical Park. Transfer of state park holdings to the US Department of the Interior was not effected until the following year due to the numerous issues requiring resolution. During the transition period, the National Park Service, which would administer the new federal historical park, began to determine the tasks requiring immediate attention, such as management and planning documents and evaluation of existing park policies. Valley Forge State Park was to be the first large-scale state holding transferred to the Department of the Interior and much work would need to be undertaken before the necessary planning documents could be put into place that would ensure the park's compliance with the federal regulations already in effect at similar sites.

During 1976 and 1977, for example, the National Park Service determined that throughout the park existing foot and horse trails would remain, that bicycling, picnicking, and kite flying would be permissible in designated areas, and that living history programs would be continued. They determined that the land north of the Schuylkill River, including portions of the Walnut Hill component landscape, would be studied for its potential acquisition as a recreation area.

Harlan Unrau's administrative history of the park indicates that the impounding basins were not transferred to the Department of the Interior with the rest of the state park lands in 1977. Unrau notes that during negotiations between the state and the National Park Service, it was determined that state would own and manage the basins for 25 years, at which time they would be transferred to the Department of the Interior.

Walnut Hill Landscape:
Natural Features, Spatial Organization, Land Use, and Vegetation.
During this period, the construction of impounding basins along the river to extract coal culm had a profound effect on the character of the Meadow Grove and Walnut Hill landscapes. The mile-long levee constructed to form the siltation basins significantly altered the relationship between the upland areas and the river, affecting views, circulation, vegetation, and land uses. The basins effectively established a physical barrier between upland areas and the river floodplain. After the activity of constructing the basins and removing the culm ceased, the structures remained in place, and currently exist as part of the Walnut Hill landscape. In 1982, the desilting basins were slated to be cleaned up by a private contractor. The hired firm, however, failed to properly remove the culm material and restore and seed the area. Deposited culm continues to occupy the interior of the lower basin. The impoundment basins currently support a thriving wildlife population, a grove of conifer trees in the upper basin, and a series of ponds in the lower basin.

Over much of the component landscape, the area of woodland cover appears to have increased during this period as former agricultural areas have been abandoned and allowed to revert to forest through secondary succession. Much of the river floodplain has become densely wooded during the twentieth century, and woodland now occupies a large portion of the center of the component landscape where fields were once located. It was also during this period that a National Recreation Trail was established along the river through the component landscape, which also altered land use patterns.

Circulation.
The Boulwares appear to have maintained existing circulation patterns at Walnut Hill during their ownership of the property. The only likely alterations included the regrading and resurfacing of the crushed stone driveway that edges the formal facade of the mansion, abandonment of a portion an earlier driveway that may have encircled the house at one time, and extension of the driveway past the house to the barn. A 1929 map of the property indicates that this drive did not originally lead to the barn entrance; the stone wall that currently edges the driveway near the house at that time extended to the side of the barn, effectively separating the residential landscape from farm operations. It is not known at what time this feature was altered, but the change likely occurred during this period. In 1982, the Secretary of the Interior designated the Schuylkill River Trail a

National Recreation Trail. (Unrau 1984: 673)

Buildings and Structures.
It is not known to what extent the Walnut Hill mansion was used regularly as a residence during the first part of the twentieth century.
“When the mansion house and the remaining 57 acre farm were sold to Philadelphia architect Lyle Boulware in 1949, the house had no plumbing, wiring or central heating system. After spending almost two decades renovating and improving the property, the Boulwares lost the mansion to a disastrous fire in 1967. A small fire was started atop one of the columns by an elderly painter when he was attacked by wasps. The fire quickly spread into the roof and within a few hours the house was almost totally consumed. The Boulwares moved into the tiny springhouse and lived out their days in the shadow of the monstrous ruin.” (McGimsey 1992: 21-22)

The older portion of the house, likely dating to Pawling-era ownership, survived the fire, but has deteriorated over the past 30 years due to neglect. The stone barn survived throughout this period. The existing garage structure located adjacent to the stone barn corral likely dates to the Boulware era but appears to have replaced an earlier structure that is indicated on a 1929 map of the property in the same location.



Figure 9. Wetherill addition to the Walnut Hill Mansion, Bouleware era (ca.1950).

NATIONAL PARK SERVICE ADMINISTRATION, 1984–2024

Overview:
The federal government acquired the Boulware property in 1984. At that time, the landscape associated with the original Walnut Hill property was incorporated into Valley Forge National Historical Park. Subsequently, the National Park Service has sought to document the history and existing conditions of the landscape and develop long-term management policies for the site's historic, cultural, and natural resources. Existing buildings and structures have been renovated to house park employees, or enclosed within safety fencing as necessary to protect the public from any associated hazards. Former fields have been maintained as open meadow to perpetuate historic land cover patterns.

Numerous studies of the property have been undertaken by the National Park Service, individuals, and local groups. In 1986, park archeologist James Kurtz undertook an assessment and inventory of the site's cultural resources that entailed documentation of its history. The property was included in a Montgomery County historical survey, and was listed as "one of several large farmsteads of extreme architectural and historical importance located off of Pawling's Road. The Wetherill barn is thought to be the largest stone barn in Montgomery County." The Pawling/Wetherill mansion has been the focus of a Historic Structure Report and two masters theses. (Kurtz 1988: 111)

As reported in the 1994 DCP, the region surrounding the Walnut Hill component landscape was experiencing rapid growth for over twenty years,
"…particularly in the King of Prussia area. Less than two miles from the park boundaries lie the Pennsylvania Turnpike, I-276, PA 422 and PA 202—all limited access highways. They not only are part of the national interstate road system, but are also major regional collector roads connecting Philadelphia and the Boston-New York-Washington corridor with the rapidly developing areas surrounding the park. The construction of PA 422, and development of plans for a county sewage facility and a water supply from the Delaware River have lifted a development ban that restricted growth for much of the townships north and west of the park. Although open less than ten years,

commuter traffic already backs up during rush hour along PA 422 every day...Expanding urbanization concerns the park staff, county officials and residents. They all recognize that increasing development impacts the park. Some of the critical issues include the loss of open space and interpretive vistas, increasing traffic volume, a changing visual character and pressure for more recreation facilities. The common assumption that Valley Forge National Historical Park will continue to function as the major open space in the region has had a significant impact on local and state plans for public land acquisition and management... Projections suggest that the park will be the largest island of green in an increasingly urbanized region. On the north side, Pawling's Road is lined with older, small residential development. These properties have become more desirable, in relation to similar parcels, because of their proximity to the park and the loss of open, rural space generally throughout the area. Audubon and Trooper Roads are becoming increasingly filled with commercial uses spurred by local development and the expansion of PA 422...Currently, much of this development is screened from the main historic and recreation areas within the park by vegetation and changes in topography. The view from the primary visitor facilities on the north side retains its high scenic value with no perceptible visual disruption at the park's boundary. The potential for significant reduction in this scenic quality is very high because many of the critical visual elements are protected by very limited preservation mechanisms." (DCP 1994: 9-10)

In 2009, a decision was reached between the American Revolution Center (ARC) and the federal government to facilitate a land transfer that expanded the Walnut Hill component landscape to include the entirety of the historic Meadow Grove property. In exchange, the ARC received the title to a tract of land owned by Independence National Historical Park in Philadelphia to use as the site of a museum documenting the American Revolution. This land transfer allowed the park to assume administration and management of natural, cultural, and archeological resources in this area, and contributed to a more complete cultural landscape. The archeological site located on the newly acquired property has recently been stabilized.

Walnut Hill Landscape:
Vegetation.
Current vegetation within the Walnut Hill component landscape generally falls within one of seven types as identified in the DCP: upland forests, embankment forests, floodplain forests, old fields, managed fields, developed areas, and wetlands. The upland forests are dominated by hardwoods typical of the oak-hickory association and are generally 100 years old or younger. They include well-developed understory, ground cover, and herbaceous layers, and appear to be generally healthy. The embankment forests are associated with the impoundment basins. They appear to represent a younger version of the upland forests, but with a limited canopy and understory and a very diverse and lush groundcover layer. A pine plantation, composed primarily of an even-aged stand of white and Scotch pine planted circa 1960 occupies the upper impoundment basin. The river floodplain is dominated by a floodplain forest approximately one hundred years of age. This community has well-developed understory and groundcover layers, but also includes invasive exotic species. Wetland areas located in the lower impoundment basin, along the old river channel and near Meadow Grove spring house, support aquatic and emergent vegetation. Old fields and managed fields occupy much of the upland terrace. These are mowed variously and are dominated by grasses, except where mowing schedules are infrequent. Woody saplings and vines rapidly colonize areas that are infrequently mowed.

The historic structures, maintenance areas, and park housing areas are managed for interpretation, recreation, and park administration, and are characterized by lawn and ornamental plantings. Additionally, an "invasion of native plant communities by exotic plants is dramatically effecting many of these vegetative patterns. Approximately 35 percent of the plant species identified in the 1985 flora and fauna study were exotic and the 1993 draft Resource Management Plan identifies exotic vine control as a prime concern." As with other areas of the park, excessive deer browse threatens forest health and impedes understory development in wooded areas of the Walnut Hill landscape. (DCP 1994: 21)

Circulation.
The Walnut Hill Driveway, located west of the estate's buildings, extends south from Pawling's Road toward the Walnut Hill Estate Tenant House. Surfaced with gravel, the driveway appears to date to

National Park Service administration of the site. The former entrance to the property, the Walnut Hill Estate Main Entrance Drive, begins at the estate's stone gate posts along Pawling's Road, extends southwest toward the Walnut Hill Estate Spring House, and turns west toward the mansion, barn, and tenant house. This circulation feature is also surfaced with gravel and public access is restricted by a chain barrier across the stone gates along Pawling's Road.

Buildings and Structures.
The remains of the Pawling Mansion bear evidence of its construction history, but the larger of its two principal sections has been removed. The larger section,
"to the south, was severely damaged by fire. Before the fire, this section was a grandly scaled country house with simple Grecian detailing. A monumental colonnade extended around the south and east facades, providing shade and a comfortable vantage point from which to view the Schuylkill River and the hill of Valley Forge beyond. This section appears to have been built in 1836 as a summer villa by John Price Wetherill. Beside its simple Greek Revival detailing, the exterior of the house was characterized by a buff colored stucco. This coating was finished with sand and scored in imitation of fine stonework and was applied to the entire house including both the 18th and 19th century sections and the brick columns. Among the surviving outbuildings on the farm, the stone privy and spring house were treated with the same stucco finish. The floor plan of the 19th century house contained elements common to many houses of its date. A central stair hall gave access to an enormous ballroom to the south and a dining room and parlor to the north. A full basement floor contained the kitchen and servant spaces. A sunken walkway below the veranda allowed for multiple windows and doors into this lower floor." (McGimsey 1992: 23-24)

The smaller northern section was,
"…a stone wing built in an altogether different scale. Local historians have long held that this end of the house was built by the Pawling family during the 18th century. When a disastrous fire destroyed the roof and upper floor of the 19th century wing in 1967, this section of the house was protected by a thick stone wall and only suffered minor damage to its roof. Rainwater and decades of neglect have since destroyed most of the remaining fabric of the 19th century wing." (McGimsey 1992: 23-24)

In 1956, a gas pipeline was laid through the area, traversing the component landscape. A linear easement is maintained clear of vegetation between the river and Pawling's Road associated with this pipeline. In the 1980s, a Pennsylvania Electric Company transmission line was constructed through the area. The corridor associated with the line is maintained clear of large woody plant material. Archeological investigation of the corridor preceded construction.

During the National Park Service administration of the Walnut Hill component landscape, additional efforts have addressed stabilizing and repairing buildings in the estate complex. In 1992, the park completed renovation work on the Tenant House and presently uses the building for park staff and seasonal staff housing. In the 1990s, the park conducted a stabilization project on the bridge house at the Walnut Hill Estate Barn involving demolition and repair with contemporary materials. None of the original roof framing survived and the project repaired the bridge house roof with a temporary plywood and felt roof. The park completed a subsequent repair project at the Walnut Hill Estate Barn in 2019 that included the selective demolition of the 1990s bridge house material, new shoring and bracing along the north wall of the barn and the south masonry wall of the earthen ramp, repointing of the barn walls, and the closing of large openings in the barn walls.

Uses

Functions and Uses:

Major Category	Category	Use/Function	Historic	Current	Primary
Defense	Military Facility (Post)	Military Facility (Post)	Yes	No	Yes
Landscape	Leisure-Passive (Park)	Leisure-Passive (Park)	Yes	Yes	Yes
Agriculture/Subsistence	Agricultural Outbuilding	Agricultural Outbuilding	Yes	No	No
Recreation/Culture	Outdoor Recreation	Campground/Picnic Area	Yes	No	No
Transportation	Water-Related	Canal	Yes	No	No
Domestic (Residential)	Estate Landscape	Estate Landscape	Yes	Yes	No
Agriculture/Subsistence	Farm (Plantation)	Farm (Plantation)	Yes	No	No
Transportation	Pedestrian-Related	Hiking Trail	Yes	Yes	No
Industrial/Processing/Extraction	Industrial/Processing/Extraction-Other	Industrial/Processing/Extraction-Other	Yes	No	No
Recreation/Culture	Monument (Marker, Plaque)	Monument (Marker, Plaque)	Yes	Yes	No
Vacant (Not In Use)	Ruin	Ruin	Yes	No	No
Vacant (Not In Use)	Vacant/Maintained (Mothballed)	Vacant/Maintained (Mothballed)	Yes	No	No

Public Access:

Public Access: Unrestricted

Public Access Narrative:

The park's Encampment Tour route is a 10-mile driving loop comprised of 9 major tour stops plus additional opportunities to stop and explore Valley Forge. No stops are currently located in the Walnut Hill component landscape. Numerous trails cross through the site. Park grounds are open daily, year-round 7am to dark (1/2 hour after sunset).

Associated Ethnographic Group

Ethnographic Study Status: No Survey Conducted

Ethnographic Narrative:

According to David Goldstein, Lead of Region 1 Tribal and Cultural Affairs, and Dr. John A. Turck, Archeologist at Valley Forge NHP/Hopewell Furnace NHS, no study has been completed at Valley Forge NHP.

Analysis & Evaluation of Integrity

Analysis and Evaluation of Integrity Narrative Summary:

The Walnut Hill landscape is primarily characteristic of its nineteenth century development as a prosperous family farm or plantation. Landscape features such as field patterns, circulation routes, building clusters, views and viewsheds, and adaptations to water resources survive from the nineteenth century, and depict the agricultural character of a prominent farmstead. While it is likely that surviving nineteenth century agricultural patterns are rooted in those established by the Pawling family in the eighteenth century, very little is known about the character of the Walnut Hill landscape prior to or during the Revolutionary War-era encampment. As such, the property's integrity for the eighteenth-century encampment-era period has been heavily diminished by the many changes that have occurred over the ensuing two hundred years.

For the nineteenth century agricultural period of significance, the component landscape retains integrity of location, feeling, and association, and, to a lesser degree, integrity of setting, design, materials, and workmanship. Certain large-scale construction projects, such as the development of the Pennsylvania and Schuylkill Valley Railroad line and US Route 422, are thought to have led to site-specific losses of potentially important prehistoric and historic resources. Nonetheless, the component landscape contributes to the park's overall integrity even though it has undergone considerable changes during the period of significance and since its end. Those landscape characteristics and features that do remain from the historic period retain integrity and should be preserved.

Various features also survive on the property that relate to important nineteenth century regional transportation developments, and to mid-twentieth century conservation efforts that have historic significance. Nineteenth century canal, road, and rail line developments retain a minimal degree of integrity; alignments and a few resources survive, but much of the historic fabric of these systems has been lost. The property also contains other landscape features that are wholly unrelated to the farm's agricultural activities, namely large siltation basins dating to the mid-twentieth century that were once used to extract coal silt from the riverbed.

The next section presents an analysis of landscape characteristics and their associated features and corresponding Historic Structures Inventory (HSI, formerly List of Classified Structures) names and numbers, if applicable. It also includes an evaluation of whether the feature contributes to the property's National Register eligibility for the historic period (ca.1710–1949), contributes to the property's historic character, or if it is noncontributing, undetermined, or managed as a cultural resource. If a feature is non-contributing, it is evaluated as "compatible" (visually congruent with the historic character of the landscape) or "incompatible" (visually incongruent with the historic character of the landscape).

Landscape Characteristic: Archeological Sites

Archeological sites are the locations of ruins, traces, or deposited artifacts in the landscape and are evidenced by the presence of either surface or subsurface features. Only archeological sites evaluated as contributing or non-contributing in approved National Register documentation are identified in this report. In the Walnut Hill CLI project area, the 2016 National Register identifies Fatland Ford as a contributing site under Criterion D: Archeology (Prehistory) for the Pre-Contact-Period Occupation of Valley Forge (8000 BCE–1600 CE):
"A Late/Transitional Archaic to Early Woodland period component of the Fatland Ford Site was identified in 1985 during the same transmission line survey that resulted in the identification of the nearby Point Bar Site. The site yielded a diagnostic Poplar Island point, a complete grooved axe, a pestle fragment and hammerstone, Marcey Creek pottery fragments, two Brewerton side-notched points, and a quartzite Madison point. While portions of the site were found to have been disturbed fairly extensively through the modern construction of the power line corridor and associated access roads, the majority appeared to retain substantial stratigraphic integrity. The integrity of the site was underscored by the survival of features and cultural material deposits variously attributed to a Revolutionary War-era market, commissary activities, or guard outposts associated with the winter encampment and later ransacked by the British. Whatever the specific nature of the post-contact-period remains, the pre-contact period deposits provide important data about the transition from the fairly well-documented Late Archaic period to the far less well-documented Early Woodland period. Specifically, the presence of fired ceramics, a pestle fragment (presumably used for food processing), and a complete grooved axe (perhaps used for woodworking in support of housing construction) supports the hypothesis of a more settled lifestyle beginning about 1000 BCE and provides critical comparative site data for inclusion and analysis within the larger regional archeological record. (Kurtz 2001: 32; NR 2016, Sec.8: 235)

Landscape Features:

Feature Name	CLI Feature ID	Feature Contribution	CRIS-HS Resource ID	Associated CRIS-AR ID	FMSS Record Type	FMSS Record Number	FMSS Exact Match
Fatland Ford Site (not mapped)	205019	Contributing		VAF000355.000			No

Landscape Characteristic: Buildings and Structures

Historic and Existing Conditions:
Buildings are elements constructed primarily for sheltering any form of human activity in a landscape, while structures are elements constructed for functional purposes other than sheltering human activity. The buildings and structures that exist within the Walnut Hill component landscape span many periods of the site's history, including the encampment and nineteenth century agricultural periods, as well as the twentieth century. The Meadow Grove spring house is the only structure to survive from a large cluster of buildings and structures that formed a farmstead precinct.

Little is known about buildings or structures that may have existed within the component landscape prior to the eighteenth century. The earliest documentation regarding settlement of the peninsula suggests that a farmstead was established near the Schuylkill River at some time after 1719 by Henry Pawling, a Dutch immigrant who relocated to the area from New York. A log structure may have first been constructed on the property to house Pawling and his large family; however, nothing is currently known about the family's earliest existence. It is highly likely that the Pawling family's earliest residence was located beyond component landscape boundaries. By the middle of the eighteenth century, it is believed that the Pawlings had become prosperous farmers, and were likely

in the position to construct a more substantial dwelling. The site of a circa 1757 Pawling farm house and an associated complex of agricultural outbuildings is currently not known and may have existed beyond contemporary component landscape boundaries. It is possible that a spring house may have existed on the current site of the Meadow Grove spring house that was a component of the Pawling farmstead.

A second farmstead complex was established on the Walnut Hill property by the Pawling family during the eighteenth century. While existing documentation is inconclusive regarding the original construction date of features associated with the farmstead, tradition suggests that the primary dwelling was already in existence at the time of the encampment. The first piece of documentary evidence regarding the Pawling farmhouse at Walnut Hill is a listing within the 1798 US Direct Tax . The house is described as a two story stone structure measuring 45 feet by 32 feet. Outbuildings listed for the property included a spring house, two other houses, and a stone barn measuring 45 by 30 feet. The two other houses may have been used by tenant farmers. The 1798 US Direct Tax also includes entries for the Meadow Grove property. The buildings listed are a stone house, barn, and spring house. The stone house and barn were likely located outside of current park boundaries. Tradition suggests that Pawling family holdings were utilized during the encampment by commissary personnel, but this use, if it occurred at all, was likely short-lived.

Archeological investigations of the area around Fatland Island have suggested the existence of a third small farm property that may date to the encampment. This farm may have been associated with Henry Pawling II's son Nathan, who is known to have lived in the area at that time. It remains possible that his residence may have been located within the component landscape.

Nineteenth century adaptations of the two Pawling farmstead complexes by Samuel Wetherill included the construction of new buildings and structures, as well as renovation and enlargement of existing structures. The spring house and one of the tenant houses listed as part of Henry Pawling III's property in 1798 at Walnut Hill may have been renovated and enlarged by Wetherill, who is known to have maintained these same types of structures on his property after 1826. Wetherill is known to have constructed a large stone barn in 1826 that stands today. The existing Meadow Grove spring house was also either renovated or constructed by Wetherill during the 1820s.

It is not known to what degree, if any, Wetherill renovated the Walnut Hill farmhouse before his death in 1829. It appears that it was his family, including his widow Rachel and son John, who enlarged and renovated the simple farmhouse into a Greek Revival mansion around 1836. A privy/storage building appears to have been constructed on the knoll to the west of the house at around the same time. Son John also constructed a large stone addition to the barn in 1845, which almost doubled its size. He also added a large stone corral to the south of the building.

The two tenant houses listed on the 1798 US Direct Tax were likely located to the west of the house. One may have been incorporated into the establishment of the existing tenant house in the 1870s. The other, likely the "old stone house" identified in an 1867 canal document, was likely located on the current site of the impoundment basins.

Little structural evidence of nineteenth and early twentieth century canal operations along the Schuylkill River remains within the component landscape today. The dam, which was anchored on the Walnut Hill property, was removed in the 1940s. Views across the river from the property, however, include Pawling's Lock, which survives.

During the 1920s, portions of the original Meadow Grove property were acquired by a real estate developer who subdivided the property. Two clusters of vacation cottages were constructed prior to the stock market crash of 1929, which effectively terminated plans to establish Valley Forge Manor on the property. These cottages were popular as weekend vacation homes with access to the river and associated recreation features. They were razed by the Commonwealth of Pennsylvania when it condemned the land in the 1940s to construct siltation basins along the river banks. Two basins were eventually constructed to be utilized in removing coal culm deposits on the river bottom in an effort to improve water quality. The lower impounding basin which includes a mile-long levee was used; the upper one was not. The levee structures and at least two weirs survive today.

In 1949, the Walnut Hill property was acquired by the Boulware family, who renovated and updated the house. It was either the Boulwares or their predecessors who constructed various structures along the entrance drive and around the house, including the stone retaining wall that edges the main entrance drive near the house, the stone gate posts that exist along Pawlings Road and at a culvert crossing of a brook near the house, and retaining wall improvements at the spring house. Much of the nineteenth century Wetherill portion of the house was gutted by fire in 1967. Although the eighteenth century portion survived largely intact, the Boulwares elected not to return to the mansion. They instead renovated the spring house as a dwelling and moved there before selling the property to the United States in 1984. Bridges that provide access across drainageways located along the Schuylkill River trail and the large electrical transmission towers that traverse the property are other twentieth century structural additions to the Walnut Hill landscape.

Currently, the buildings and structures that survive within Walnut Hill include the Meadow Grove spring house, the Walnut Hill mansion, the Walnut Hill springhouse, tenant house and associated outbuilding, the privy/storage structure, large stone barn and associated corral, the two impoundment basins and associated waste weirs, stone wall remnants, transmission towers, pedestrian bridges along the Schuylkill River trail, and retaining walls and gateposts along the Walnut Hill entrance drive.

Evaluation:
Numerous buildings and structures, and remnants of structural features, survive from the site's eighteenth and nineteenth century periods of significance. These include the Meadow Grove spring house, the Pawling mansion, spring house, barn and corral, tenant house, privy/storage structure, and the tenant house outbuilding (Figures 16, 17, 18, 19, and 20). The Meadow Grove spring house currently suffers from neglect and is in poor condition. It is, however, a contributing feature of the nineteenth century agricultural period of significance, and may incorporate an earlier structure associated with the Pawling family. The Pawling mansion is now comprised of only its eighteenth century section; the ruins of the nineteenth-century section damage in the fire have been removed. The large barn associated with the Walnut Hill Estate has been stabilized but is in poor condition. It and the other surviving outbuildings that date from the nineteenth century similarly contribute to the site's agricultural period of significance.

Twentieth century structural additions to the landscape, such as the impoundment basins and associated waste weirs and the overhead transmission towers, are non-contributing elements of the Walnut Hill landscape. The dates of origin for various structures have not yet been determined. Many of these, such as the Walnut Hill Estate retaining wall and gateposts, the spring house retaining wall, and the entrance drive gate posts, contribute to the nineteenth-century period of significance (Figure 21).

Landscape Features:

Feature Name	CLI Feature ID	Feature Contribution	CRIS-HS Resource ID	Associated CRIS-AR ID	FMSS Record Type	FMSS Record Number	FMSS Exact Match
Meadow Grove Spring House Ruin (B-81)	97338	Contributing	22354		Location	93676	Yes
Pawling House (B-86)	98199	Contributing	080280		Location	28398	Yes
Stone Wall Remnant at Meadow Grove Spring House (S-94)	97342	Contributing	1171508				No
Walnut Hill Estate Barn (B-84)	97345	Contributing	80282		Location	28400	Yes
Walnut Hill Estate Culverted Stream (S-104)	205018	Contributing	081425		Asset	568421	Yes
Walnut Hill Estate Privy and Storage Building (B-85)	98200	Contributing	80287		Location	39034	Yes
Walnut Hill Estate Retaining Wall (S-97)	98201	Contributing	80289		Location	39036	Yes
Walnut Hill Estate Spring House (B-87)	98203	Contributing	80281		Location	28399	Yes
Walnut Hill Estate Spring House Retaining Wall (S-98)	98202	Contributing	080290		Asset	1482630	Yes
Walnut Hill Estate Stone Corral (S-96)	98204	Contributing	80283		Asset	1482629	Yes
Walnut Hill Estate Stone Gate Post System (S-99)	98164	Contributing	80288		Location	39035	Yes
Walnut Hill Estate Tenant House (B-82)	98205	Contributing	80285		Location	28401	Yes
Walnut Hill Estate Smokehouse Ruin (Tenant House Outbuilding) (B-83)	98206	Contributing	80286		Location	39033	Yes
Footbridges (S-101)	97335	Noncontributing			Location	39520	No
Impoundment Basin / Levee (S-95)	97336	Noncontributing			Location	94618	Yes
Large Concrete Culvert (S-103)	97337	Noncontributing					No
Pawling's Bridge (S-92)	97339	Noncontributing					No
Pawling's Dam and Lock No. 62 Ruins (S-91)	97340	Noncontributing					No
Transmission Towers (S-100)	97344	Noncontributing					No
Waste Weir (S-93)	98207	Noncontributing					No
Stone Wall (S-14)	97341	Undetermined					No
Structural Ruins (S-102)	97343	Undetermined					No

Landscape Characteristic Graphics:



Figure 16. Meadow Grove Spring House Ruin, B-81, view southwest. (OCLP, 2019)



Figure 17. Pawling Mansion, B-86, view southwest. (OCLP, 2019)



Figure 18. Walnut Hill Estate Spring House, B-87, view west. (OCLP, 2019)



Figure 19. Walnut Hill Estate Barn, B-84, view northeast. (OCLP, 2019)



Figure 20. Walnut Hill Estate Tenant House, B-82, view north. (OCLP, 2019)



Figure 21. Walnut Hill Estate Stone Gate Post System, S-99, view south. (OCLP, 2019)

Landscape Characteristic: Circulation

Historic and Existing Conditions:

Circulation refers to the spaces, features, and applied material finishes that constitute systems of movement in a landscape. The origins of existing circulation features span various periods of the Walnut Hill component landscape's history, including the eighteenth century pre-encampment settlement period, the nineteenth century agricultural period, and the twentieth century. Some circulation features may potentially pre-date European settlement; certainly the Schuylkill River has been utilized as a transportation corridor since prehistory.

The Schuylkill River was probably a prominent and culturally significant feature of the prehistoric and the early European contact period landscapes. Use of the river for passage and for commerce continued throughout the eighteenth century. While it is not known to what extent they may have been integrated into prehistoric or early European contact circulation systems, the peninsula of land located near the confluence of Perkiomen Creek and the Schuylkill River on which the Walnut Hill component landscape is located abuts two important river crossings known as Pawling's Ford and Fatland Ford. By the second quarter of the eighteenth century, early roads connected with these river crossings.

During the early eighteenth century, the first immigrant to settle the peninsula, Henry Pawling, recognized the opportunity furnished by the ford site adjacent to his land. By the middle eighteenth century, his family had established a ferry across the river at the site. The road today known as Pawlings Road traversed the central portion of the peninsula, terminating at the ford/ferry site. Across the river, a road led west toward the French Creek iron works. To the east, the road led towards Philadelphia. Henry Pawling's property also abutted another ford, now known as Fatland Ford, which similarly appears to have been known to travelers as a safe and convenient place to cross the river for some time before it is formally integrated into a road system in 1736. This road—known as Baptist Road—led south towards Radnor, and north to a mill along Perkiomen Creek. To the north of the river, the road served as the boundary between Pawling's property to the west, and that of James Vaux to the east. Little is currently known about the access and farm roads that must have existed on the Pawling property during the eighteenth century to provide connections between primary public roads and the family's farmstead and fields.

Baptist Road and the Fatland Ford were used by the British Army during the fall of 1777 to march north on their way to Philadelphia after burning a forge and Continental Army supply facility across the river along Valley Creek. During the encampment period, both fords, as well as the roads leading to them, were utilized by the Continental army for the transport of troops and goods across the river. It is likely, too, that the Pawling ferry and ford were integral to the transport of men and materials across the river during the encampment period. In order to facilitate river crossings, the army constructed a wooden bridge structure—known as Sullivan's Bridge—during the early part of 1778 just downriver from Fatland Ford. The bridge and Baptist Road were utilized by Washington and his army to decamp from Valley Forge in June 1778.

Sullivan's Bridge was destroyed by river flooding in 1779, but was not replaced. A new bridge, however, was constructed across the Schuylkill River near Pawling's Ford in 1810, replacing the ferry and the use of the ford. River flooding similarly led to the destruction of the structure in 1820, but it was quickly rebuilt. Baptist Road and use of Fatland Ford appear to have been abandoned during the nineteenth century. As with earlier periods, little is currently known about the access and farm roads that must have existed within the Walnut Hill component landscape during this period to provide connections between primary public roads and the existing farmsteads and fields.

Later during the nineteenth century, the Walnut Hill component landscape was traversed by two large-scale public transportation systems that represented new innovations in commerce and travel: the Schuylkill Navigation Company canal, and the Pennsylvania and Schuylkill Valley Railroad. The first evolved in response to the need to enhance commercial use of the river. Throughout much of the eighteenth century, individuals and groups often constructed weirs across the river to restrict fish movement. These, in turn, created hazards for those attempting to navigate the river, such as the commercial boats traveling between Reading and Philadelphia that provided a critical connection between agricultural products and urban markets. The conflicts between commercial use of the river and general transportation and fishing uses were frequently addressed in acts passed by local and state governmental agencies restricting non-commercial activities, but the acts

were enforced with varying degrees of success.

In 1815, the Schuylkill Navigation Company was established to promote commercial interests and river transportation. By 1824, they had established a canal along the Schuylkill River corridor between Reading and Philadelphia, which was later extended to the north. The canal was comprised of slackwater river sections and excavated prisms. The portion of the river edging the component landscape was part of a slackwater section of the canal. Dams were constructed at Catfish Island, located not far downstream from the component landscape, and Pawling's Ford to raise the level of the river to a navigable level. Locks were integrated into the dams to raise or lower the canal barges to the level of the adjacent section. Pawling's Dam, as it was named, included a large stone retaining wall on the eastern bank of the river, a large stone lock structure on the western bank, and a wooden dam section between. The canal's towpath paralleled the river on the Pawling property, and included a relatively level passageway edged as necessary with stone retaining walls. In 1846, the towpath was relocated to the opposite bank of the river, and Pawling's Dam lock was enlarged. Remnants of the early towpath are still visible in the Walnut Hill landscape.

In the 1880s, the Pennsylvania and Schuylkill Valley Railroad constructed a rail line on the upper plateau running along the eastern edge of the component landscape. This rail line began operating in 1884. The line has since been abandoned and removed, but its alignment is still visible within the component landscape and it now serves as a paved trail.

It is not until the late nineteenth and early twentieth centuries that documentation of the character and configuration of the Walnut Hill landscape becomes available. These documentary sources include atlases of Montgomery County, aerial photographs, site plans, and subdivision plans. Middle to late nineteenth century atlases of Montgomery County, for example, indicate that single, straight drives or lanes led from Pawling's Road to dwellings at the original Henry Pawling property, Walnut Hill, and the William Pawling property (to the east of the component landscape). A site plan of Walnut Hill from the 1920s is more detailed. It depicts a driveway leading to the Walnut Hill mansion, and beyond to the barn, from Pawling's Road. Archeological investigation of the area around the house suggests that the drive may have encircled the house at one time. This driveway subsequently follows the side of the barn and leads north, past an orchard surrounding the existing privy, before turning to the northeast and providing access to the springhouse. The road forks before meeting the orchard, with one fork leading past the tenant house before returning to Pawlings Road. Portions of this drive system have since been abandoned and exist only as traces in the landscape. A new western route between the tenant house and Pawlings Road was constructed in the 1980s by the National Park Service.

Subdivision of the Meadow Grove estate occurred in the 1920s. While much of the northwestern portion of the component landscape was platted as part of the Valley Forge Manor Development with small lots and numerous roads, only two of the roads were actually built. These include current-day Sullivan and Washington Boulevards, which form a portion of the Valley Forge National Historical Park boundary. Roads were also likely constructed to connect vacation cottages and tents established along the river, but only traces of portions of these roads survive.

Additional twentieth century circulation improvements at Walnut Hill include the establishment of the Schuylkill River Trail along the river after 1942, an associated visitor parking area near the Meadow Grove springhouse, access roads leading to the impoundment basins established in the 1940s by the Commonwealth of Pennsylvania, and to the gas pipeline and overhead transmission line utility easements also established during the late twentieth century. Route 422, a limited access highway, was constructed along the eastern margin of the component landscape during the late twentieth century. Filling associated with the construction of the roadbed altered existing topography in the region, including a portion of the Baptist Road trace. The trace is very much in evidence, however, further to the south.

Both the canal and the rail line were abandoned during the twentieth century. While the tracks associated with the Pennsylvania and Schuylkill Valley Railroad rail line have been removed, the rail bed, constructed of fill and cinders, is still in evidence adjacent to Route 422 and is used by park maintenance vehicles for access and as a trail. Features associated with the canal, including the

towpath, stone retaining walls and edging, and Pawling's Lock are still in evidence within and adjacent to the component landscape.

Circulation routes that currently exist within the component landscape include Sullivan and Washington Boulevards, the Schuylkill River Trail, a U-shaped access drive at Walnut Hill, with access spurs to the springhouse and barn complex, a parking area at Meadow Grove, and unimproved access roads leading to the impoundment basins and utility easements. Traces and sites of many circulation features associated with eighteenth, nineteenth, and twentieth century uses survive throughout the area. These include Baptist Trace, site of Fatland and Pawling's Fords, Walnut Hill drive trace, canal towpath trace, rail line bed, and former farm lane traces.

Evaluation:
Various circulation features survive within the Walnut Hill landscape from the site's periods of historical significance, including the eighteenth century encampment period and nineteenth century agriculture period. These include the Fatland and Pawling's Ford sites, the trace of Baptist Road, the existing eastern portion of the Walnut Hill property entrance drive, and the western drive trace (Figure 12). It is likely that the fords and possibly the alignment of Baptist Road were utilized during earlier periods by prehistoric peoples and immigrants of European descent during the seventeenth century. There are remnants of circulation features associated with nineteenth century canal use of the Schuylkill River and the Pennsylvania and Schuylkill Valley Railroad.

Circulation features that have been established during the twentieth century on the property as part of residential, recreational, and utility line development post-date the property's periods of significance and are non-contributing resources. These include Pawling's parking area, Sullivan and Washington Boulevards, the Schuylkill River Trail, various access roads, the recently established western access drive at Walnut Hill, and the spring house access drive (Figures 13, 14, and 15).

Landscape Features:

Feature Name	CLI Feature ID	Feature Contribution	CRIS-HS Resource ID	Associated CRIS-AR ID	FMSS Record Type	FMSS Record Number	FMSS Exact Match
Baptist Road Trace (C-85)	98209	Contributing	1171504		Location	82630	Yes
Driveway Trace (C-79)	98210	Contributing	1171505				No
Fatland Ford (C-86)	98211	Contributing					No
Pawling's Ford (C-87)	98213	Contributing					No
Schuylkill River Trail (former Rail Line Trace (C-82)	98215	Contributing	1171506		Location	110893	Yes
River Trail (former Towpath Trace) (C-81)	98220	Contributing	1171507		Location	39520	No
Walnut Hill Estate Main Entrance Road (C-78)	98223	Contributing	81423		Location	104514	Yes
Impoundment Trail (former Access Road) (C-76)	98208	Noncontributing			Location	237283	No
Pawling's Parking Area (C-71)	98214	Noncontributing			Location	39884	Yes
Road Trace (C-75)	98216	Noncontributing			Location	237283	Yes
River Trail (former Schuylkill River Trail) (C-72)	98217	Noncontributing			Location	39520	No
Spring House Driveway (C-80)	98218	Noncontributing			Location	104514	Yes
Sullivan Boulevard (C-73)	98219	Noncontributing					No
Transmission Line Access Road (C-84)	98221	Noncontributing					No
Walnut Hill Driveway (20th century) (C-77)	98222	Noncontributing			Location	39502	Yes
Walnut Hill Parking Area (C-88)	98224	Noncontributing					No
Washington Boulevard (C-74)	98225	Noncontributing					No
Commissary Trail (former Path / Trail) (C-83)	98212	Undetermined			Location	82638	Yes

Landscape Characteristic Graphics:



Figure 12. Walnut Hill Estate Main Entrance Road, C-78, view north. (OCLP, 2019)



Figure 13. Pawling's Parking Area, C-71, view northeast. (OCLP, 2019)



Figure 14. Schuylkill River Trail, C-72, view southwest near Fatland Ford, C-86. (OCLP, 2019)



Figure 15. Walnut Hill Driveway (20th century), C-77, view south. (OCLP, 2019)

Landscape Characteristic: Cluster Arrangement

Historic and Existing Conditions:
Cluster arrangement is the locations and patterns of buildings, structures, and associated features in the landscape. The primary clusters located on the property throughout history have been the Meadow Grove and Walnut Hill farmsteads. While only a springhouse survives at Meadow Grove, the farmstead with which it was associated appears once to have been quite extensive. It most likely included a dwelling, various agricultural outbuildings, and stone walled corral areas, as well as orchard plantings, and associated circulation features. Evidence of these features and their cluster arrangement survives only within the archeological record. Many of the sites of former structures reside on property not currently included within Valley Forge National Historical Park.

At Walnut Hill, however, much of the farm cluster, which includes elements spanning at least one hundred years of additive development, survives. It includes the intact portions of a large dwelling, privy, spring house, barn and large corral, tenant house and additional outbuildings, which are linked by roads and paths marked by features such as stone retaining walls, steps, and gate posts.

Archeological investigations have yielded evidence of a potential additional farmstead located near Fatland Island. The archeological remains of a dwelling may relate to the Nathan Pawling farmstead thought to have existed within the area at the time of the encampment. Further investigation of this site is needed to accurately document its history.

Landscape Features:

Feature Name	CLI Feature ID	Feature Contribution	CRIS-HS Resource ID	Associated CRIS-AR ID	FMSS Record Type	FMSS Record Number	FMSS Exact Match
	98226	Undetermined					No

Landscape Characteristic: Small Scale Features

Historic and Existing Conditions:
Small-scale features are elements that provide detail and diversity for both functional needs and aesthetic concerns in the landscape. Few small-scale features currently exist within the Walnut Hill component landscape. It is likely that there have been a variety of small-scale features associated with cultural use of the property over time, but the majority have been lost, and little is known about their character or composition. Surviving small-scale features generally date from to the twentieth century, with a few notable exceptions.

Based on conjecture, it may be surmised that during the early settlement of the landscape by the Pawling family, wooden fences were likely erected to enclose cultivated fields and kitchen gardens, although nothing is known about the locations of these features. Bridges or stream and drainageway crossings may have also been erected to provide access to farm fields. Protection of freshwater resources, especially springs, of which there are many on the property, likely occurred when they existed in close proximity to dwelling complexes. A well ruin located near the Pawling mansion may be an example of an eighteenth century small-scale feature that survives.

Little is known about small-scale features that may have been established on the property during the encampment period. Knowledge of specific small-scale features established during the nineteenth century is also very limited. Fencing, constructed of wood or stone, was most likely an important element of the landscape. A late nineteenth century illustration of the property suggests that a stone wall ran between the stone barn corral and the river at that time. It is possible that the culvert along the stream corridor and the brickwork at the spring house that exist today were constructed during the latter part of the nineteenth century.

Likely twentieth century small-scale additions to the landscape include a granite marker established along the banks of the Schuylkill River by the Montgomery County Historical Society in 1907 to commemorate the site of Sullivan's Bridge during the encampment, hot bed and grape arbor garden features below the barn, wooden fencing at the tenant house, security fencing around the Walnut Hill mansion ruins and the Meadow Grove spring house, informational signs along the Schuylkill River Trail, and markers indicating the alignment and easement associated with a gas pipeline through the area.

Evaluation:
The only small-scale feature that exists at Walnut Hill dating from the eighteenth century appears to be the well ruins near the Pawling mansion. Small-scale features that likely survive from the nineteenth century likely include the Walnut Hill Estate culvert/stonework along the stream corridor, and the spring house brickwork. Small-scale features that were established during the twentieth century include tenant house fencing, the Sullivan's Bridge Monument, security fencing, and the gas pipeline easement and markers (Figure 23). The date of origin for remnant iron fencing identified near Fatland Island during archeological investigations of the area, and a possible well near the lower impoundment basin, have not been determined.

Landscape Features:

Feature Name	CLI Feature ID	Feature Contribution	CRIS-HS Resource ID	Associated CRIS-AR ID	FMSS Record Type	FMSS Record Number	FMSS Exact Match
Sullivan's Bridge Monument (SS-75)	98230	Contributing	22536		Location	39358	Yes
Walnut Hill Estate Culvert / Stonework (SS-71)	98233	Contributing	1171509		Location	237283	No
Walnut Hill Estate Well Ruins (SS-74)	98235	Contributing	22626		Location	238064	No
Security Fencing (SS-76)	98229	Noncontributing					No
Tenant House Fencing (SS-72)	98231	Undetermined			Asset	1482626	Yes
Unknown Landscape Feature / Possible Well (SS-79)	98232	Undetermined			Location	73718	No
Walnut Hill Estate Spring Brickwork (SS-73)	98234	Undetermined	81424		Location	28399	No

Landscape Characteristic Graphics:



Figure 23. Sullivan's Bridge Monument, SS-75, view north. (OCLP, 2019)

Landscape Characteristic: Land Use

Historic and Existing Conditions:
Natural systems and features are the natural aspects that have influenced the development and physical form of the landscape, and can include geology, geomorphology, hydrology, ecology, climate, and native vegetation. Land uses are the principal activities in a landscape that form, shape, and organize the landscape as a result of human interaction. Spatial organization is the three-dimensional organization of physical forms and visual associations in a landscape, including the articulation of ground, vertical, and overhead planes that define and create spaces.

The area's landform, topography, and natural resources, particularly soils, geology, and water systems, have had a great influence on the land uses and spatial organization of the Walnut Hill component landscape throughout its cultural history. The earliest cultural occupation and use of the Walnut Hill component landscape was nomadic and likely focused at least seasonally around the Schuylkill River, local springs, and the knolls affording good views of the surrounding area. After Europeans began to settle within the area, agricultural use of the fertile soils and gently sloping topography of the uplands became the focus of regional activities. The Perkiomen peninsula quickly became a prosperous agricultural community of farmsteads and plantations, which are thought to have supported the 1777–1778 military encampment of the Continental Army across the river at Valley Forge. After the encampment, agriculture continued to serve as the dominant land use of the peninsula. Its growth was supported by advances in transportation systems during the nineteenth century, including the development of a canal along the river and rail lines, both of which facilitated the delivery of farm goods to urban markets.

Located over the southern half of a peninsula formed by a bend in the Schuylkill River and its confluence with Perkiomen Creek, the Walnut Hill component landscape occurs within an area with a long history of cultural use involving its suitability for agriculture and association with water resources. Various features survive within the Walnut Hill landscape that are illustrative of past land uses and the manner in which existing natural resources have been adapted to cultural uses during the eighteenth, nineteenth, and twentieth centuries. In fact, the land uses associated with the Walnut Hill component landscape have had a direct effect on patterns of spatial organization over time.

Prior to the seventeenth century, the landscape appears to have been primarily wooded, and part of the Eastern deciduous forests that characterized much of the Atlantic Coast at European Contact. Archeological evidence suggests long-standing prehistoric occupation of the peninsula, dating from the Early Archaic through the Late Woodland periods, likely due to an abundance of food and water resources, prime prospect locations, fertile soils, and important circulation features, including two river fords. Known prehistoric sites associated with the Walnut Hill component landscape are clustered in two areas: the upland plateau that occupies the northeastern section of the component landscape, and the margins of springs, perennially flowing stream corridors, and the Schuylkill River. While little is known about the specifics of prehistoric use of this landscape, conjectural models developed by archeologists suggest that Archaic period peoples would have migrated throughout the landscape in search of food, settling along the banks of the river in the spring and summer to take advantage of the shad runs and other fishing opportunities, harvesting nuts in the fall, and hunting deer and other herds of game. Later periods, notably the Woodland prehistoric period, appear to have witnessed a greater cultural reliance on plant resources for food. It is possible that Woodland period peoples established more permanent settlements within this landscape, cultivating crops for food. Little is known about the affect prehistoric peoples may have had on land cover in the area—to what extent they practiced cultivation of plants or manipulated woodland understory to enhance views. Little is also known about potential circulation systems that provided connections between this and other regions, although the shallows at Fatland and Pawling's Fords may have been used to cross the river, and would also have been good locations for catching fish. The numerous springs located at Walnut Hill and Meadow Grove may have served as important seasonal camp sites during prehistoric periods.

While little information exists regarding occupation or use of the Walnut Hill landscape during the Early European Contact period of early to late seventeenth century, it is generally known that the Dutch and Swedish were the first Europeans to occupy the region. Knowledge of cultural features

that may have been developed within the component landscape during the seventeenth century, or features that may have been established by early settlers, is limited. However, the river was likely a popular route of travel, and circulation routes may have incorporated the two fords noted above. The focus of early occupation and settlement appears to have been the trapping of beaver for their pelts. These animals were plentiful along the banks of the Schuylkill. Swedish immigrants, more interested in cultivation than the fur trade, may have established limited farming operations within the region during the seventeenth century. Except for limited areas of cultivation that may have been established by prehistoric peoples or early Swedish settlers, the Walnut Hill component landscape was likely predominantly wooded until the eighteenth century.

It is during the eighteenth century that documentary evidence of European settlement begins to become available. Between the early seventeenth century and the encampment period, we know agriculture quickly became the dominant land use of the area. Highly suited to agricultural crops and cultivation, the uplands of the peninsula were likely methodically cleared of woodlands prior to the encampment. By the middle part of the eighteenth century, woodlands probably did not comprise more than 30 percent of the land cover and was found primarily on land that was marginal for agriculture: areas of steep topography, margins of streams, rivers, roadways, fields, and properties, and abandoned, exhausted, or fallow fields. Much of the remainder of the landscape was maintained in open land cover comprised primarily of crops. Fences and hedgerows likely enclosed the field areas, which were generally one to ten acres in size each, and the farmstead precincts. Fencing was used to prevent access by free-ranging livestock.

Since at least the early eighteenth century, spatial organization of the peninsula has revolved around a central circulation corridor, which generally divides the peninsula into two equal halves. The Walnut Hill component landscape is located in the western end on the southern half, below the central circulation corridor. Eighteenth and nineteenth century family property ownership and, to a limited degree, farmstead development, however, did span the central roadway. Within the component landscape, the most intensive cultural developments have tended to focus on the upland terraces and the river margins, with agricultural uses, such as crop fields, woodlots, and pastureland, occurring between them. The region's proximity to a major waterway—the Schuylkill River—also contributed to eighteenth century settlement as a means of transportation and a source of fresh water. Springs existed in various locations throughout the component landscape, further supporting cultural uses and activities.

The first documented European settlement on the peninsula was by Henry Pawling I, who occupied the western edge of the peninsula, near a river shallows that was referred to as an "old" ford by the second quarter of the eighteenth century. The central road across the peninsula was connected via ford to a road leading west toward French Creek settlements and associated industry, and east towards Philadelphia. A second ford located to the southeast of Pawling's property connected to a road leading south toward Radnor. Pawling and his family quickly established agricultural operations and a farmstead complex on the property, taking advantage of strongly-flowing spring resources, the existing fords, and prime agricultural soils. Little is known about the site or character of the Pawling family's first farmstead, but by the middle of the eighteenth century they appear to have become successful and prosperous farmers, continuing to modify the landscape by cultivating ever increasing plots of land. They grew a variety of crops, including grains, vegetables, and a limited amount of tobacco, as well as orchards of fruit trees.

By 1750, the Pawlings had established a ferry service across the river near the existing ford site. A complex of dwellings and agricultural outbuildings was later established nearby, possibly replacing an initial farmstead composed of a log residence, just above the floodplain of the river. The dwelling cluster included a springhouse to protect a strongly flowing spring providing the family with a good source of fresh water. The family continued to engage in subsistence-level agriculture on this property throughout the remainder of the eighteenth century and into the early nineteenth century.

By the late eighteenth century, the Pawling family had established a second farmstead on the property at the current location of Walnut Hill. This central portion of the peninsula is comprised of a relatively level plateau edged by more steeply sloped embankments that fall away toward the river

floodplain. Numerous strongly flowing springs and a perennial stream corridor traverse the plateau. These resources were likely an important consideration in the siting of the farmstead. By the nineteenth century, this dwelling complex is known to have included a residence and various outbuildings associated with agriculture, as well as two supporting dwellings that may have housed tenant farmers. Again, little is known about the character of the farmstead or the supporting fields and woodlots, but they were likely similar to those described above.

During the 1810s and 1820s, much of the Pawling family property was acquired by the Wetherill family, who, in the 1820s and throughout the remainder of the nineteenth century, established the majority of the landscape features that are in evidence today. It is likely that, in addition to the dwelling and tenant complex currently located on the knoll overlooking the river, that the extant field patterns were established during this period, although to some degree they may have been based on patterns established by the Pawling family.

It was also during the nineteenth century that new transportation systems were established through the region that had an impact on the character of Walnut Hill and the relationship between the property and the river. These systems included a canal located along the Schuylkill River, which involved the construction of a dam below Pawling's Ford, and a towpath adjacent to the river along the length of the Wetherill property during the 1820s, the construction of a bridge across the river near the original Pawling's Ford site in 1810, and the establishment of a rail line along the component landscape's eastern margin during the 1880s.

Wetherill family use and occupation of the Walnut Hill landscape, particularly for agriculture, began to decline during the early part of the twentieth century. William Wetherill sold off the original Henry Pawling property, which was later subdivided. Portions were developed for residential use, with connections made to the river for recreational purposes. While the development of this area was abandoned after the stock market crash in 1929, the character of this area had already been irrevocably altered.

Much of the landscape along the river front was significantly altered during the mid-twentieth century when large siltation basins were constructed as part of a dredging operation to remove coal culm from the river basin. A mile-long levee constructed of rock and earth dramatically altered the gently sloping landform that once dropped away toward the river from the dwelling complex. This period also witnessed the expansion of nearby Valley Forge State Park into this landscape, as lands along the Schuylkill were appropriated by the state to protect the park's viewshed, and park and recreational land uses were initiated within the area. In 1984, the National Park Service furthered this process, acquiring much of the remainder of Walnut Hill and incorporating it into Valley Forge National Historical Park.

The existing Walnut Hill landscape includes features which may be attributed to many of the periods of site development summarized above. While the landscape best approximates the nineteenth century agricultural period through its spatial organization, land cover, and relationships to natural features, other periods of landscape evolution are also in evidence. For example, features associated with the early nineteenth century canal exist along the riverfront, the rail bed of the Pennsylvania and Schuylkill Valley Railroad line characterizes the eastern portion of the component landscape, and the impoundment basins of the mid twentieth century dominant the river terrace landscape below Walnut Hill. Traces of other features, such as Baptist Road, that helped to spatially structure the site during earlier periods, are also in evidence within the component landscape.

Evaluation:
The topography and natural resources associated with the Walnut Hill component landscape reflect to a great degree the conditions that existed during the prehistoric period. Generally, the Schuylkill River, spring sites, stream channels, ford sites, and Fatland Island are resources that survive from the component landscape's prehistoric, agricultural, and encampment-era periods of significance, although in some cases, such as coal culm deposition along the river floodplain, their character has been altered to some degree during subsequent periods of the landscape's history. The site's landform, characterized as a relatively level plateau that is edged by more steeply sloped

embankments that fall away to the river's floodplain, spans the area's cultural history. The relationship between the upland plateau and the river floodplain within the southwestern portion of the site has, however, been heavily altered during the twentieth century through the establishment of a large impoundment basin complex. The banks of the Schuylkill River and its channel alignments have also changed, due in part to nineteenth century canal development, and siltation.

The spatial configuration of the peninsula has generally evolved from a primarily wooded condition, to a relatively open one, and back again over a three hundred year period. Although the upland terrace in the vicinity of the Walnut Hill farmstead remain open, much of the site has been allowed to revert to woodland, erasing the open agricultural character that likely dominated the majority of the peninsula during the middle eighteenth through the early twentieth centuries.

The farmstead complexes, centered in the western portion of the peninsula and on the upper plateau, continue to exhibit the relationship to existing natural conditions that led to their selection as sites for development, including abundant supplies of fresh water, gentle topography and upland plateaus affording a good command of the surrounding landscape, access to prime agriculture soils, and proximity to important circulation routes, such as river shallows providing ford locations. Remnants of the canal system along the river's edge also continue to exhibit the important role of the river in the transportation history of the region.

Subdivision of portions of the Meadow Grove estate reflects the decline of regional farming during the early twentieth century and resultant changes in land uses. Limited evidence of the resort development along the river—cottage sites, docks, and landings—and the Schuylkill River trail exhibit a response to the recreational needs and interests of a growing population. Recreation and commemorative uses, as part of Valley Forge State Park and Valley Forge National Historical Park have now supplanted working agriculture as the primary land uses within the area.

Landscape Features:

Feature Name	CLI Feature ID	Feature Contribution	CRIS-HS Resource ID	Associated CRIS-AR ID	FMSS Record Type	FMSS Record Number	FMSS Exact Match
	98236	Undetermined					No

Landscape Characteristic: Vegetation

Historic and Existing Conditions:
Vegetation includes deciduous and evergreen trees, shrubs, vines, groundcovers, and herbaceous plants and plant communities, whether indigenous or introduced in the landscape. Existing vegetation patterns generally reflect land use and management practices post-dating the nineteenth century agricultural period of significance. The land cover associated with open fields has changed from crop fields and pastureland to mown grass and forb meadows. Woodlands occupy a greater percent of the landscape than they did during the eighteenth and nineteenth centuries, and their composition has changed over time due to succession and the introduction of exotic species.

Vegetation has changed to a great degree over the past three hundred years, and has been largely influenced by cultural land uses. Little is known about the region's vegetation during prehistoric periods. Generally, the Walnut Hill component landscape falls within the area thought to have been dominated by Eastern temperate deciduous forest at the time of European contact. This forest was characterized by oaks, hickories, and maples, and various well-developed layers of vegetation. It is not known to what extent prehistoric peoples manipulated or altered the forest cover to cultivate plant foods or to establish an environment conducive to hunting game. Similarly, it is not known

whether the forests were altered during the European contact period when Swedish and Dutch immigrants first traveled the region via the Schuylkill River.

During the early to mid-eighteenth century, the Pawling family established a subsistence-level agricultural plantation on the site. Typically, early settlers first needed to clear their land of woody growth prior to cultivating crops. By the mid-eighteenth century, it is thought that 70 percent of the land in the region had been cleared for cultivation and that 30 percent was left in woodland, a ratio that was maintained for at least a century. Woodlands, necessary to supply wood for fuel and building materials, typically occupied steep slopes, floodplains, and other areas marginal for cultivation, and also colonized fields left fallow after soils had been depleted of nutrients through cultivation. The resulting second or third growth woodlands were not generally of the same character as the original deciduous forests due to the fact that soils were often depleted and that livestock were allowed to forage in them, effectively reducing ground cover, shrub, and understory vegetation layers. Hedgerows would have existed along property and field boundaries and where land management practices changed. Cultivated crops known to have been associated with the property included wheat, corn, buckwheat, hay, oats, tobacco, and rye. Orchards are thought to have been established on local properties during the eighteenth century, and continued to be a part of the Walnut Hill landscape at least through the early part of the twentieth century. Kitchen gardens, lawns, and possibly ornamental flower gardens were also a part of the Walnut Hill landscape, based on review of a map prepared in 1867 by the Schuylkill Navigation Company that indicates the presence of “hot beds,” or plant cultivation features, below the Walnut Hill barn corral.

As agriculture became less profitable throughout the southeastern Pennsylvania region during the late nineteenth century, vegetation patterns on the property slowly shifted from a predominance of open agricultural fields to woodland on the less productive lands, particularly the river floodplain and the terrace slopes. During the twentieth century, the Meadow Grove property was sold to developers. A portion was subdivided for residences. Cottages were built along the river, occupying in part the former Meadow Grove orchard. A large impoundment basin was also constructed on the lower river terrace between Meadow Grove and Walnut Hill, and agricultural uses were displaced. Woodlands now occupy much of the former Meadow Grove property, the impoundment basins, and the river floodplain. Agricultural field patterns survive in the vicinity of Walnut Hill, although crop fields have been replaced by mown meadows. Lawns continue to surround the houses and outbuildings. There are at least three large trees in existence on the property that may have been old enough to have witnessed encampment-era activities—a large oak located along the property boundary to the west of Walnut Hill, a sycamore near the Walnut Hill springhouse, and a hackberry along the river (Figure 10). These likely existed during the eighteenth and nineteenth century periods of significance and are contributing vegetation features. The areas currently maintained in open field, meadow, and lawn are also contributing vegetation features (Figure 11).

Evaluation:
The broad patterns of vegetative composition at Walnut Hill have generally witnessed a shift from woodland, to open agricultural fields, and a return to woodland over the past three hundred years. Prior to settlement by the Pawling family, the component landscape was likely mostly wooded. During the eighteenth and nineteenth century agricultural and encampment-era periods of significance, the component landscape was likely characterized by large expanses of open agricultural fields, including crop lands, orchards, and kitchen gardens enclosed by fencing and hedgerows, as well as pastures and woodlots on the steep slopes, river floodplains, and exhausted fields. It is likely that woodland cover that existed at the time of the encampment was cut over by the soldiers to meet their needs for fuel and shelter, leaving an almost entirely open landscape. As the focus of large-scale agriculture shifted to America’s Midwestern region during the second half of the nineteenth century, agriculture in southeastern Pennsylvania declined. Concurrently, the percentage of the Walnut Hill landscape maintained in crop fields and pasture also declined, and woodland cover increased due to passive management. During the twentieth century, many of the small-scale features of the formerly agricultural properties, such as orchards, kitchen gardens, fencing, and farm lanes were lost to residential subdivision development and neglect. While open fields continue to characterize the upland plateau associated with Walnut Hill, the remainder of the site is now wooded.

Landscape Features:

Feature Name	CLI Feature ID	Feature Contribution	CRIS-HS Resource ID	Associated CRIS-AR ID	FMSS Record Type	FMSS Record Number	FMSS Exact Match
Meadow or Lawn Area (Ve-9)	98711	Contributing			Asset	1128649	Yes
Pennsylvania State Champion Tree (Hackberry) (Ve-42)	98713	Contributing			Location	237283	No
(Possible) Encampment-Era Sycamore Tree at Spring House (Ve-7)	98632	Contributing			Asset	1128648	Yes
Hedgerow (Ve-44)	98710	Noncontributing			Location	73718	No
Ornamental Planting (Ve-41)	98712	Noncontributing			Location	73718	No
Pine Plantation (Ve-43)	98714	Noncontributing			Location	237283	No
Successional Growth / Woodland (Ve-45)	98715	Noncontributing			Location	237283	No

Landscape Characteristic Graphics:



Figure 10. Possible Encampment-Era Tree, Ve-7, view west. (OCLP, 2019)



Figure 11. Meadow or Lawn Area, Ve-9, view northwest. (OCLP, 2019)

Landscape Characteristic: Views and Vistas

Historic and Existing Conditions:
A view is the expansive and/or panoramic prospect of a broad range of vision that may be naturally occurring or deliberately contrived. A vista is a controlled prospect of a discrete, linear range of vision, which is deliberately contrived. Little documentary information exists regarding views or vistas associated with Walnut Hill over the course of its cultural history. The importance of particular views can be inferred from the siting of farmsteads, and a limited knowledge of archeological resources.

Prehistoric resources have been identified in two primary types of locations—along stream and river corridors, and atop the prominent upland terrace associated with Walnut Hill. While it is not known to what extent prehistoric peoples manipulated woodland cover to enhance views for hunting, or cleared lands for cultivation, it is likely the upland terrace was selected as an occupation site for the potential prospect it afforded.

Settlement of this landscape by the Pawling family during the early eighteenth century first occurred in close proximity to the Schuylkill River. It is not known whether the farmstead site afforded views of the river or to what extent views played a role in the siting of landscape features. It is also not known how use of the property contributed to the defensive strategy of the Continental Army encamped at Valley Forge during winter and spring of 1777–1778. Archeological investigations have suggested that pickets or guards may have been stationed within the upland terrace on the unprotected eastern flank of the peninsula, in order to take advantage of the site's commanding views.

The Walnut Hill farmstead appears to have been sited on a high point affording long views toward the river. The area of Washington's Headquarters and the landscape of the Valley Forge area are visible from the farm cluster. A nineteenth-century painting of the property from a perspective across the river suggests that much of the landscape between the house and the river was open, allowing for views across the gently sloping terrain. It shows that the house likely commanded views over much of its surroundings. Twentieth-century construction of impoundment basins on the lower river terrace has completely altered this visual and spatial relationship.

Evaluation:
Generally, the unrestricted views that would have occurred throughout much of the peninsula during the eighteenth and nineteenth centuries has been lost due to a proliferation of woody growth during the twentieth century. While woodlands now occupy much of the lower river terrace and floodplain, portions of the upland terrace continue to be managed as open fields, and views toward the Schuylkill River and the landscape beyond that likely contributed to the original siting of the Walnut Hill mansion remain an important characteristic of this site (Figure 22). The other primary impediment to historic viewsheds is the levee of Impoundment Basin No. 21. This structure has adversely affected the original relationship between Walnut Hill and the terrain as it fell away toward the river floodplain.

Landscape Features:

Feature Name	CLI Feature ID	Feature Contribution	CRIS-HS Resource ID	Associated CRIS-AR ID	FMSS Record Type	FMSS Record Number	FMSS Exact Match
View toward Headquarters (V-22)	98716	Contributing					No
View toward River (V-21)	98717	Contributing					No

Landscape Characteristic Graphics:



Figure 22. View toward River, V-21, view south. (OCLP, 2019)

Condition

Assessment Interval (Years): 6

Next Assessment Due Date: 02/20/2030

Condition Assessment and Impacts

Condition Assessment: Fair

Assessment Date: 02/20/2024

Condition Assessment Explanatory Narrative:

The Walnut Hill landscape is in “fair” condition. Buildings within the Walnut Hill landscape have all been stabilized, but the area lacks a cohesive interpretive identity. The recently constructed Sullivan’s Bridge connects the north and south sides of the park for pedestrian and bicycle access for the first time since the demolition of the Betzwood Bridge in 1995, presenting an opportunity to integrate Walnut Hill and the neighboring Betzwood and Fatland areas into the broader Valley Forge NHP landscape. The adverse impacts from adjacent lands caused by the private property subdivision of the Meadow Grove and the Pawling farmstead have been resolved by the 78-acre land transfer with the American Revolution Center (ARC) completed in 2009, and the entirety of these properties is under the administration of the National Park Service. The archeological sites located in these areas are now complete and have been stabilized. Initial seeding of the transferred land area introduced invasive plant species, but maintenance has restored healthy native meadows to the area and invasive species are no longer considered to be a significant threat. However, invasive plants are present in some fields that have reverted to successional forests.

A condition assessment of “fair” indicates that the property shows clear evidence of minor disturbances and deterioration by natural and/or human forces, and some degree of corrective action is needed within 3-5 years to prevent further harm to its cultural and/or natural values. If left to continue without the appropriate corrective action, the cumulative effect of the deterioration of many of the landscape characteristics will cause the property to degrade to a poor condition.

Condition Assessment: Poor

Assessment Date: 09/21/2021

Condition Assessment Explanatory Narrative:

Provisional. The condition reassessment for this CLI has been delayed due to Covid-19 travel restrictions and staffing shortages. In the meantime, the most recent condition assessment will remain in place until it is reassessed as part of a comprehensive update of the entire CLI. Planning and scheduling this update will occur in FY 2022.

Condition Assessment: Poor

Assessment Date: 09/08/2009

Condition Assessment Explanatory Narrative:

The Superintendent, in consultation with Deirdre Gibson, Chief of Planning and Resource Management, agreed with this evaluation. Vegetation continues to threaten ruins and stone walls, and buildings and structures suffer from deferred maintenance and erosion along river bank. A "poor" evaluation indicates the inventory unit shows clear evidence of major disturbance and rapid deterioration by natural and/or human forces. Immediate corrective action is required to protect and preserve the remaining historical and natural values.

Condition Assessment: Poor

Assessment Date: 09/05/2003

Condition Assessment Explanatory Narrative:

Deferred maintenance on the buildings is threatening them. Vegetation needs to be removed from the ruins and stone walls to prevent further damage to these resources. Erosion from the river is negatively impacting structures such as retaining walls and the tow path. Unauthorized mountain bike usage is also contributing to erosion. Fields left to succession evidence a strong influx of invasive plants, and the increased deer population has destroyed the understory vegetation.

Condition Assessment: Fair

Assessment Date: 09/30/1998

Condition Assessment Explanatory Narrative:

The superintendent's concurrence on this CLI, which was completed several years ago, was given with the proviso that the condition assessment will be reevaluated in the coming year.

Impacts

Type of Impact: Adjacent Lands

Other Impact:

External or Internal: External

Impact Narrative: A portion of Meadow Grove has been subdivided. The small lot residences affect a portion of the Walnut Hill viewshed. Archeological remains of the Pawling farmstead are located on private property, and may be threatened by future development.

Date Identified: 07/29/2005

Type of Impact: Deferred Maintenance

Other Impact:

External or Internal: Internal

Impact Narrative: Structures located on the property are deteriorating due deferred maintenance.

Date Identified: 07/29/2005

Type of Impact: Deferred Maintenance

Other Impact:

External or Internal: Internal

Impact Narrative: Structures located on the property are deteriorating due to deferred maintenance.

Date Identified: 02/20/2024

Type of Impact: Erosion

Other Impact:

External or Internal: Internal

Impact Narrative: Erosion from the river is negatively impacting structures such as retaining walls and the tow path. Unauthorized mountain bike usage is also contributing to erosion.

Stabilization costs include:
Protect Sensitive Resource From Unauthorized Bicycle Use (PMIS 52545) = $7,872
Rehabilitate Heavily Used Trails (PMIS 107790) = $10,000 (also see Valley Forge Landscape for other half of this funding)

Date Identified: 07/29/2005

Type of Impact: Erosion

Other Impact:

External or Internal: Internal

Impact Narrative: Erosion from the river is negatively impacting structures such as retaining walls and the tow path. Unauthorized mountain bike usage is also contributing to erosion.

Date Identified: 02/20/2024

Type of Impact: Other

Other Impact: Pests and Disease

External or Internal: Internal

Impact Narrative: The increased deer population has damaged the understory vegetation.

Date Identified: 02/20/2024

Type of Impact: Pests/Diseases

Other Impact:

External or Internal: Both Internal and External

Impact Narrative: The increased deer population has destroyed the understory vegetation.

(See PMIS 92929 noted in Landscape CLI.)

Date Identified: 07/29/2005

Type of Impact: Vegetation/Invasive Plants

Other Impact:

External or Internal: Internal

Impact Narrative: Fields left to succession on this site evidence a strong influx of invasive plants. Invasive exotic plants, which have the potential to disrupt vegetation patterns, are actively managed by the park, but could easily become a problem if management programs were curtailed.

No additional stabilization costs required.

Date Identified: 07/29/2005

Type of Impact: Vegetation/Invasive Plants

Other Impact:

External or Internal: Internal

Impact Narrative: Fields left to succession on this site evidence a strong influx of invasive plants. Invasive exotic plants, which have the potential to disrupt vegetation patterns, are actively managed by the park, but could easily become a problem if management programs were curtailed.

Date Identified: 02/20/2024

Treatment

Stabilization Measures

Treatment Documents

Treatment Type: Undetermined

Treatment Completed: No

Document Type: General Management Plan

Title:

IRMA Link:

Narrative:

The park's 2007 General Management Plan (GMP) does not specifically address a landscape treatment strategy for the Walnut Hill component landscape. The GMP proposed three alternatives for the future management of the park – a no-action alternative that is a baseline for comparison, and two action alternatives – and identified "Alternative C" as the Environmentally Preferred Alternative and the NPS Preferred Alternative. Regarding the landscape, the landscape of the core interpretive focus areas would evoke the eighteenth century. Some historic views would be rehabilitated to facilitate interpretation. Most areas of the park would be preserved as is. The health of the forests and meadows would be enhanced through active environmental restoration. Through-traffic on public roads would be calmed, in partnership with state and local government. To enhance the visitor experience, some roads in the park would be closed to through- and visitor-traffic. Visitors could use a shuttle or walk or bike. (GMP 2007: v-viii)

The park completed a Foundation Document in 2019, which identified fundamental resources and values. Those most applicable at the Walnut Hill landscape included the Encampment Landscape, Encampment-Era Historic Structures, Encampment-Era Archeological Resources, Commemorative Landscape, Meadows, and Personal Renewal. Other resources and values not fundamental to the purpose of the park or possibly unrelated to its significance, but important to consider in planning processes, were also identified. Those related to the Walnut Hill landscape included Post-Encampment Cultural Landscapes and Historic Structures, and Recreation Activities. (FD 2019: 7-9)

Approved Treatment Costs

Cost Narrative:

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Landscape Documents:

File Name	Date	Attachment Type
CL-FMSS_crosswalk-VAFO_WalnutHill_CLIUpload.xlsx		Other Report

Source