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Cultural Landscape Report

Washington Monument Grounds



December 2003

(Revised August 2011, January 2015)

WASHINGTON MONUMENT GROUNDS
CULTURAL LANDSCAPE REPORT

PREPARED FOR

National Park Service

Denver Service Center

National Capital Regional Office

National Mall and Memorial Parks

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COVER ILLUSTRATION: 2006 view of the Washington Monument and Grounds. (Carol Highsmith, 2006)

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For nearly 20 years, Stephen Lorenzetti supported the preservation of the monuments, memorials and landscapes of the National Mall. He played a key role in the restoration of the Washington Monument façade and interior commemorative stones in the late 1990s, and the rehabilitation of the Washington Monument grounds in 2005. After the August 2011 earthquake, Steve was the first person up the stairs to report the damage, and was instrumental in the subsequent repairs to the Washington Monument. The National Park Service would like to acknowledge the energy and continuous care brought to this and related projects by Stephen C. Lorenzetti (1960-2014), Deputy Superintendent, National Mall and Memorial Parks.

FOREWORD

The development of this cultural landscape report has occurred in multiple stages by numerous authors. Originally drafted in 2003, this document was refined in 2011 to include the findings from the 2009 Cultural Landscape Inventory. This information was added to the 2003 report as an executive summary. However, following the 2011 revisions, and prior to finalizing the report, a 5.8 magnitude earthquake shook Washington, D.C., more than 80 miles away from its epicenter near Mineral, Virginia on August 23, 2011. The earthquake caused considerable damage to numerous buildings and structures in Washington, D.C. At the Washington Monument, the seismic action broke and cracked masonry, shook mortar from vertical joints between stones, damaged the lightning protection system, and bent the elevator counterweight rods. Although never considered structurally unsound, the monument was immediately closed. Following extensive repairs over the next three years, the Washington Monument reopened to the public on May 12, 2014.[1]

Despite the damage caused by the earthquake, the Washington Monument Grounds were minimally impacted and today retain substantial integrity and continue to reflect the conditions at the time of the cultural landscape inventory in 2009.

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[1] MORE INFORMATION ON THE WASHINGTON MONUMENT REPAIRS CAN BE FOUND IN THE FOLLOWING DOCUMENTS: SCHNABEL ENGINEERING. *MEMORANDUM ON EARTHQUAKE DAMAGE OBSERVATIONS AT WASHINGTON MONUMENT, WASHINGTON DC*. SEPTEMBER 6, 2011; WISS, JANNEY, ELSTNER ASSOCIATES, INC. AND TIPPING MAR. *WASHINGTON MONUMENT SEISMIC ASSESSMENT*. AUGUST 29, 2012.

Executive Summary

EXECUTIVE SUMMARY

The following is the Executive Summary (ES) requested originally by the National Park Service (NPS) in the 2007 scope of work for the "Revision and Completion of Washington Monument Cultural Landscape Report" (CLR).[i] The NPS subsequently developed the ES to provide an explanation for the delay in publishing the CLR. The NPS also wished to provide a description of the existing conditions of the Washington Monument Grounds and updated visual documentation (including maps, drawings, and photographs) of the area.

The NPS initiated the CLR process in 2002 to provide treatment recommendations for a portion of the Washington Monument Grounds, also known as Reservation 2. The study area for the CLR was limited to the area immediately surrounding the monument. John Milner Associates, Inc. (JMA) completed the first draft of the Washington Monument Cultural Landscape Report (CLR) in 2003 in association with Grunley-Walsh Joint Venture. The project did not reach completion at this point because of professional differences of opinion between the NPS and JMA on at least two significant points. First, NPS disagreed with JMA's proposal to expand the period of significance for the grounds beyond the 1848-1943 period. Although the NPS originally considered expanding the period to encompass the years 1791 to 1961, in July, 2002, the NPS and the State Historic Preservation Office (SHPO) of the District of Columbia Office of Planning agreed that the shorter time period was more appropriate because it encompassed "the most significant events associated with the site beginning in 1848 with construction of the monument and ending in 1943 with extension of Independence Avenue through the grounds and the dedication of the Thomas Jefferson Memorial, which is the culmination of the McMillan Plan."[ii] The NPS and JMA also disagreed on the designation of character areas and management zones within the boundaries of the monument grounds. The NPS, in collaboration with the Historic Preservation Review Board (HPRB) and the National Capital Planning Commission (NCPC), ultimately designated five areas: 1) the Axis; 2) the Plaza; 3) the Mound; 4) the Flats; and 5) the Sylvan edge.[iii] The resolution of these two issues is reflected in the current (2011) ES.

Throughout 2003 and 2004, NPS and JMA worked to finalize the CLR. However, due to a contracting dispute, the review work did not progress. In September 2007, the NPS developed an updated scope of work that called for a new assessment of existing conditions in addition to revisions of fact, spelling, and style. JMA revised the CLR in 2008 in accordance with the final set of comments provided by the NPS in 2003. They did not update the existing conditions as defined in the 2007 scope of work. JMA's final submission provided the NPS with a draft ES (2007) and a revised version of the CLR (2008), which did not include the updated conditions assessment or final proofing for publication. The completion in 2009 of the Washington

Monument Grounds Cultural Landscape Inventory (CLI) that documented all of Reservation #2 with an updated existing conditions assessment made it necessary to revise the ES of the CLR. This summary incorporates information from all previous documents for final publication. Endnotes in the CLR identify information that has been amended in the ES.

The ES consolidates the information from the 2003 CLR and the 2009 CLI. Differences between information in the CLR and the CLI are reflected in the remainder of this summary. The information included is the most current and thorough possible. The primary difference between the two is that the CLR describes the conditions before the implementation of the approved 2002 landscape design concept developed by Olin Partnership. In addition, the CLR does not include the South Monument Grounds (the area south of present-day Independence Avenue) within the study boundaries. The CLI reflects conditions for the entirety of Reservation #2 after the 2005 completion of the design and other changes to the landscape around the monument. While the CLI at times relied on the CLR, the information provided in the CLI is current and, to some degree, more extensive than that provided in the CLR. Although edited, the NPS maintained the narrative content of the CLR and, as a result, the ES should be considered an addendum to the CLR. However, ES references to "existing conditions" reflect conditions as they existed at the time the 2009 CLI document was produced.

The remainder of this summary is divided into three large sections: 1) Additions to Historic Conditions, with particular attention to the period of significance; 2) Updated Existing Conditions; and 3) Visual Documentation. Within these categories, the NPS made every attempt to follow systematically the order of the CLR. Thus corrections, addendums, and other changes are organized within these broad sections by the building, structure, circulation pattern, or topographical feature affected. Unless otherwise noted, all sections below are taken verbatim from the 2009 CLI.

The following features were analyzed and evaluated in the CLI but were not included in the CLR because they were either not in place, not specifically identified, or fell beyond the original CLR project boundaries:

Contributing	**Non-Contributing**	**Undetermined**
Boat Dock and Gate	Benches—cast iron and wood slat *(Tidal Basin)*	Retaining Wall *(Independence Avenue)*
Catalpa Tree at Survey Lodge	Benches—marble *(Monument Plaza and Monument Lodge)*	
Elm—large *(Tidal Basin, near intersection of Raoul Wallenberg place and Main Avenue)*	Monument Lodge Uplights	
Elms *(Raoul Wallenberg Place)*	Monument Plaza**	
Elms *(Survey Lodge Southwest Grove)*	Niche lights in the granite retaining wall at the knoll	
Elms *(Tidal Basin Parking Lot)*	Plantings in German-American Friendship Garden***	
Independence Avenue Corridor* *(including Maine Ave. Corridor)*	Plantings along Maine Avenue	
Raoul Wallenberg Place Corridor	Retaining Wall *(15th Street)*	
Tidal Basin Seawall *(Figure ES-9*)	Retaining Wall *(Monument Knoll)*	
Street Trees along Tidal Basin Parking Lot	Sidewalks and bus pull-off along Raoul Wallenberg Place	
Sylvan Theater stage	Street Trees along Raoul Wallenberg Place	
Tidal Basin cherry groves	Sylvan Theater dressing rooms	
Tidal Basin parking lot corridor	Sylvan Theater sheds	
Tidal Basin pipe handrail	Tidal Basin parking	
Tidal Basin walk	Tulip Library	

** In the CLR, this is listed as "Independence Avenue Corridor, including sidewalks" and omits Maine Avenue because it was outside the boundaries of the project.*

*** The Monument Plaza was listed as a contributing feature in the 2003 CLR and changed to a non-contributing feature in the 2009 CLI.*

**** The CLI includes "German-American Gardens," which covers the same area as the CLR.*

ADDITIONS TO HISTORIC CONDITIONS

The primary difference between the 2003 CLR and the 2009 CLI is that the latter includes a general history of the south monument grounds (the area "between present-day Independence Avenue and the Tidal Basin to the south, 15th Street to the east, and 17th Street to the west"); a history of topographical developments of the same area; offers greater detail about developments of Independence Avenue, the Tidal Basin Seawall, and River Road; and incorporates discussions of the Propagating Gardens.[iv] In addition to these changes, the findings of two subsequent archaeological reports (the first completed prior to the planning for the National Museum of African American History and Culture and the second completed prior to the construction of the Potomac Park Levee closure) offer additional insight into the early development of the area.[v]

Pre-History and Early Development

National Museum of African American History and Culture (NMAAHM)

During the course of a "geoarchaeological investigation and archaeological survey" completed to evaluate the impact of the planned NMAAHM, additional evidence was uncovered about the part of the Washington Monument Grounds "bounded by Constitution Avenue, 14th Street, 15th Street, and Madison Drive Northwest."[vi] This study, undertaken in two phases by the Louis Berger Group, Inc. (LBG), was the first of its kind conducted in this area, and "subsurface testing indicates that the site contains area of a preserved natural landscape surface that corresponds with the south bank of Tiber Creek. There also appears to be an early nineteenth-century landscape surface that was created in conjunction with the extension of the Washington City Canal within the channel of Tiber Creek." Upon further investigation into these sites, the LBG discovered "both prehistoric and early nineteenth-century artifacts." The prehistoric artifacts, thought to be related to similar artifacts collected during the 1880s and currently maintained by the Smithsonian Institution, suggests "episodic use of the south bank of Tiber Creek over thousands of years."[vii] The nineteenth-century artifacts were a variety of "domestic refuse (ceramics, bottle glass, oyster shell, animal bone, etc.)" as well as a concentration of brick rubble that may correspond to structures located along the canal or to temporary buildings that stood on the monument grounds during the Civil War or the final phase of construction of the Washington Monument."[viii]

Potomac Park Levee

Due to new federal "standards for flood control, a new structure is being designed" that would improve the effectiveness of the Potomac Park Levee and would "involve the use of a removable post and panel closure system in conjunction with flanking walls that

would extend from 17th Street onto the adjacent areas of Constitution Gardens and the Washington Monument Grounds" (*Figure ES-11*).[ix] The Louis Berger Group, Inc. (LBG) conducted a Phase IA archaeological study of the area to assess the potential impact of this levee closure system on the site. According to archival and other documentary evidence, the site may contain extensive archaeological evidence regarding the 17th Street Wharf, which was "one of the largest wharves along the city's waterfront during the nineteenth century." As such, the wharf could be eligible for nomination to the National Register of Historic Places. Its significance comes from its "association with early urban development" and the "early infrastructure of the national capital city; as an "example of one of the first public works built by the City Council"; and as a site that "was closely associated with enslaved and free African-Americans, both in its construction and its operation."[x] As a result of preliminary investigation, the LBG "recommended that a program of subsurface archaeological investigation be undertaken to document any physical remains of the wharf" which was, as of August 4, 2011, ongoing.[xi] They further recommended that the archaeological investigation be coordinated with construction in order to circumvent the "challenges of opening archaeological excavations in a public park and busy roadway."[xii]

South Monument Grounds

General History

The designed vista along the north-south axis of the monumental core, between the White House, Jefferson Pier, and Thomas Jefferson Memorial is unobstructed. Trees on the south monument grounds and along Constitution Avenue have been thinned to preserve views between these structures. However, maturing trees on the south monument grounds (south of Independence Avenue) almost completely block the view of the Thomas Jefferson Memorial from the monument and only the top of the dome is visible from the monument plaza.[xiii]

Greenhouses, shops, and offices were located on the southern portion of the monument grounds… from the 1870s through the first half of the 20th Century. The extension of Independence Avenue through the grounds required the removal of many of the buildings in 1942, though 25 buildings remained on the grounds after road construction was complete. These remaining maintenance complex buildings were removed from the grounds in 1962 and relocated to just south of the 14th Street Bridge in East Potomac Park.[xiv]

Little is known about the circulation of the south monument grounds (located south of present-day Independence Avenue) until the end of the 19th century, after the nursery grounds (later referred to as propagating gardens) were added to the site. Roadways and pedestrian paths were constructed during the early 1890s and in the early 1900s a grid-like system of roads through the propagating grounds was constructed. During this time River Road was constructed along the Tidal Basin. These roads remained on the site with little change until the 1940s, when the Independence Avenue extension was constructed.[xv]

Topographical and Vegetation History

The topography of the south monument grounds (south of Independence Avenue) has historically been characterized by a gradual sloping to the Tidal Basin. This section of the grounds includes land that was reclaimed from the Potomac River during the last two decades of the 19th century. An 1862 map of Washington DC shows that the south grounds did not originally extend beyond the 16th Street axis; land was filled in to the west of the existing section to form the area known as the Potomac Flats that still exists today ("Bird's Eye View of the City of Washington, DC, and the seat of War in Virginia," drawn and published by John Bachmann, 1862). Previous to the filling of the Potomac Flats, the south grounds bordered the Potomac River and would have been low and marshy.

The first recorded change to the topography took place in 1876, when an embankment east of the greenhouses, along 15th Street, was cut down and graded to the level of the propagating gardens and monument grounds. The propagating gardens underwent minor re-grading during the construction of new plant houses and buildings, such as in 1896 when a new carnation house was built, or in 1901-1902 after the new office was constructed near the north entrance to the propagating gardens, land north and west of the office were graded. Land west of the storehouse and shop (which flanked the east entrance to the grounds along 15th Street, just north of the main entrance to the Bureau of Engraving and Printing) was cut down and graded.

The filling of the Potomac Flats took place between 1882 and 1901. By 1890 all of the proposed reclaimed land had been filled, though work continued through 1901 to raise the level of the land to three feet above the 1877 flood stage – one of the worst floods in Washington, DC history. Construction of the seawall around the Tidal Basin proceeded from 1895 through 1896 and protected the reclaimed land from future erosion. Low portions of the land were filled and graded after portions of the Potomac Flats adjacent to the south monument grounds were transferred to Office of Public Buildings and Grounds

(OPBG) in 1899 and 1901. The 1942-1943 construction of the Independence Avenue extension required topographical changes in the area of the Independence Avenue overpass. Earth was removed along the path of westbound Maine Avenue to allow it to pass under eastbound Independence Avenue, and other changes were made for the overpass and road system through the south grounds.[xvi]

South of present-day Independence Avenue, the first recorded street tree planting took place in 1901-1902, when 52 American elms (*Ulmus americana*) and 39 Norway maples (*Acer platanoides*) were planted along the sides of the newly marked out roadways within the propagating gardens. Trees lined the roadways in the southern section of the propagating gardens until the Independence Avenue extension construction in 1942-43. The construction of the road extension was planned to minimize the removal of trees in this area, although the majority of the internal roadways were removed at that time. A 1948 photograph of the south monument grounds show that trees lining the 15th Street entrance to the propagating gardens remained, but other street trees were taken out during construction of Independence Avenue (National Park Service photograph, March 31, 1948) Elm trees (*Ulmus sp.*) were planted along River Road the early 20th century and lined the drive throughout the period of significance.[xvii]

Independence Avenue Extension and Overpass Bridge

During the early 1940s a new road system was constructed through the south monument grounds and West Potomac Park. The road system would allow for greater access to the newly constructed Pentagon by allowing defense workers to use either the 14th Street or Memorial Bridges to reach it. Independence Avenue was extended to the Lincoln Memorial (near 23rd Street), while Maine Avenue was extended to 17th Street. The dual highway system, all drives of which were one-way, was designed to preserve the northern neck of the Tidal Basin, views of the area, and as many trees as possible. The design included a bridge (later named Kutz Bridge) carrying eastbound Independence Avenue traffic over the north end of the Tidal Basin. Westbound traffic on Independence Avenue passed north of the Tidal Basin on a separate roadway. An overpass was constructed where eastbound lanes of Independence Avenue passed over the westbound Maine Avenue lanes… The bridge [was] faced with mica schist in a random ashlar arrangement, with granite coping. All construction on the bridge was completed by September 11, 1943.[xviii]

Propagating Gardens

Building on the southern portion of the monument grounds (south of present-day Independence Avenue) did not occur to a significant degree until the 1870s, when greenhouses were moved from propagating gardens then located at the corner of Missouri Avenue and 3rd Street in 1873. Greenhouses, tropical plant houses, hot beds, and potting sheds continued to be built, repaired, or expanded in the propagating gardens through the end of the 19th century and into the 20th century. Early construction on the site was characterized by frame buildings which were often built of scrap material or from buildings removed from other sites and reassembled once they reached their new location. In 1882, a carpenter shop was moved to the north end of the propagating gardens after construction was completed on the War, State, and Navy departments' new buildings and was used for an office, storage, and work space. Major improvements to the propagating gardens began soon after the addition of land from the reclaimed Potomac Flats in May 1899. A brick storehouse was built in 1900 to replace the shacks that had previously been used for storage, followed by a brick building on the site of the old carpenter's shop. This new building included shops for carpenters, painters, plumbers, tinners, and blacksmiths, and had an engine room, storerooms, and toilet room. Both brick structures were located along 15th street and flanked the east entrance to the propagating gardens, where granite gateposts were constructed in 1900-1901. During the same time, a new building replaced the old office building at the north entrance to the grounds. This new office, a two-story frame structure, was relocated from the northeast corner of President's Park when the statue of General Sherman was erected in 1898-1901. Five greenhouses located at the White House were torn down during the autumn of 1902. Using much of the original material, they were rebuilt on the propagating gardens (Report of the Chief of Engineers for the fiscal year ended June 30, 1903). These greenhouses continued to be used for White House flowers and plant storage during the winter months. Buildings were maintained on the propagating gardens until the early 1940s, when the new highway system through the monument grounds and West Potomac Park required their removal. Many of the greenhouses, shops, storehouses, and offices located on the monument grounds were relocated to Anacostia Park, though twenty-five buildings were left on the grounds after construction was complete. These buildings were located along 15th Street and between Maine Avenue, S.W. and Independence Avenue, S.W until 1962, when they were removed from the site.[xix]

In 1891, a 210-foot roadway was constructed through the propagating gardens. 15th Street, which was the eastern border of the propagating gardens, was extended between C and D streets south in 1899-1900. The roadway was improved in 1900-1901 when a 60-foot portion of the road was graded and sidewalks and gutters were added. New roads were marked out within the propagating gardens as part of the 1902 Plan for

Improvement of the Monument Grounds. The plan called for a grid of three north-south roads and three east-west roads; later maps of the area from 1909, 1924, and 1930 indicate that the plan was carried out. The maps also show that there were three entrances to the propagating grounds–two along Park Drive Way (which ran slightly north of the path of Independence Avenue today) and one along 15th Street. Roadways within the propagating grounds changed little until 1942, when the Independence Avenue Extension was constructed. Although a majority of the roads within the grounds were demolished, the eastern-most north-south road through the grounds remained, as did the 15th Street entrance to the grounds.[xx]

River Road

General History

River Road (now the Tidal Basin Parking Lot) was created soon after the Potomac Flats infill was completed. The new macadam-paved road connected 17th Street with 15th Street and ran along the edge of the Tidal Basin. At the same time this road was created, a 17-foot wide bridal path was constructed parallel to it, beginning along the east side of 17th Street and continuing along the Tidal Basin. The road continued to be used after the Independence Avenue extension was built, though it was no longer directly connected to 17th Street. It is unclear when the road began to be used for parking, or whether this use dates from the period of significance.[xxi]

Vegetation History

Street trees were planted along both sides of River Road soon after the road was constructed in 1902-1903. Some of the trees along the side of the road closest to the basin were eventually replaced after the first cherry trees were planted in 1912. Trees lined River Road and the Tidal Basin continuously through the end of the period of significance.[xxii]

Tidal Basin Seawall

The Tidal Basin seawall, including the portion within the Washington Monument Grounds, was constructed from April 1895 through September 1896, the last of the seawalls to be completed. The seawall around the other portions of reclaimed land was completed in 1894. The wall was built on footing that was already in place and, from that footing, was six feet high, four feet wide at the base, and two and a half feet wide at the top. Throughout the period of significance the portion of seawall along the south

monument grounds remained relatively unchanged, though walks were constructed and safety rails—similar in design to those in place today—had been constructed by 1919.[xxiii]

UPDATED EXISTING CONDITIONS

Discrepancies between the 2003 CLR and the 2009 CLI regarding existing conditions are resolved in this section. This update accounts for the 2004-2005 renovation of the Washington Monument Grounds completed to improve security measures; offers details of the 2005-2006 renovation of the Monument Lodge; includes information regarding the intention for and partial implementation of the 2002 Olin concept plan for vegetation; offers greater insight into the architectural components of the temporary visitor screening facility built in 2001; describes the changes to the Washington Monument Grounds caused by construction plans for the National Museum of African American History and Culture and the construction of the 17th Street Potomac Park Levee closure; and includes greater structural and maintenance details about the Washington Monument and the surrounding structural and topographical landscape. This section is further subdivided into "Buildings and Structures," "Circulation," "Topography," and "Small Scale Features." One minor discrepancy that arises is in the description of the Comfort Station. The CLI describes it as an ovular structure that is 30-35 feet in diameter; the CLR describes it as circular and 28 feet in diameter. Because the Cultural Landscape Inventory for Constitution Gardens also describes it as "slightly ovoid in plan," the ES includes the description from the WAMO CLI as the authoritative document.[xxiv]

Buildings and Structures

Washington Monument

Since the period of significance [ended in 1943], the monument has undergone two cleanings, once in 1964 and again from 1998 to 2000, during which time it was covered with a blue-gray mesh which enclosed the scaffolding.[xxv]

In addition, a temporary visitor screening facility was constructed at the monument's base in 2001. The facility measures approximately 12-15 feet high, 10 feet wide, and 20 feet deep. Its construction imitates the stone blocks of the Washington Monument. It remains in use today.[xxvi]

Monument Lodge

All additions were removed during the monument's renovation in 2005-2006, which restored the exterior of the lodge to its original appearance. The lodge continues to house restroom facilities, ticketing, and a book shop. The integrity of the Monument Lodge has been retained, especially since accretions dating from after the period of significance have been removed from the structure.[xxvii]

Jefferson Pier

The Jefferson Pier today sits on a treeless part of the site, a conspicuous component of the landscape and a surviving structure from the early history of the monument grounds. Recent grounds security improvements, which included re-grading the monument mound, did not adversely affect the pier itself, though it now sits slightly below grade. The Pier retains its significance and integrity as a marker of L'Enfant's original cross-axes.[xxviii]

Sylvan Theater

The Sylvan Theatre continues to be a venue for public gathering and events on the Washington Monument Grounds, but has been significantly altered since the period of significance. The first permanent stage was built in 1944, followed by the proscenium arch in 1966. During the 1976 bicentennial, several changes were made to the theater and its surroundings: a comfort station was built near the theater; the Kodak Theatre, a temporary visitor center that was removed shortly after the end of the bicentennial, was built between the Sylvan Theatre and the Monument Lodge; the Sylvan Theatre itself was renovated, with an enlarged stage, enclosed dressing rooms, and sheds added.[xxix]

The integrity of the Sylvan Theatre as a gathering and performing space has been affected by the security improvements that were implemented on the monument grounds in 2003-05. The eastern walkway and walled terrace cut through the area which was previously an uninterrupted lawn sloping up from the stage to the Washington Monument on which audiences were seated. Some of the sheds near the rear of the theater are in poor condition.[xxx]

Comfort Station

The Comfort Station was designed by National Park Service architect Ben Biderman. The structure is oval shaped with a flat roof and an approximately 30-35 foot diameter. It has separate entrances on either side for men's and women's restroom facilities. The comfort station's walls are constructed of aggregate cement panels.[xxxi]

Retaining Walls

Maine Avenue

The retaining walls on either side of westbound Maine Avenue, just west of the Independence Avenue Overpass, may date to the construction of the Independence Avenue extension project which was completed during the period of significance. Both retaining walls form an arch and are approximately a foot and a half high at their midpoints and ten feet long. They are constructed of multi-colored grey and brown stones of varying shapes and sizes, though the stones at the top of the walls are all rectangular and roughly the same size. The wall's appearance suggests that they were part of the 1942 construction, but their contributing status is undetermined.

A granite retaining wall was constructed along the north side of Jefferson Drive during the latter half of the 20th century, perhaps in association with or after the 15th Street realignment in 1993. The retaining wall measures approximately 25 feet long and three feet high and are non-contributing features of the site.

The Knoll

Security improvements to the monument grounds in 2004-2005 included the construction of 30-inch high granite retaining walls that encircle the monument in overlapping rings. The walls of the retaining walls are faced with two courses of dark gray (Ash Rose) granite veneer with a rock-pitch finish, topped with a solid granite cap. Along the inside of the retaining wall, three feet from the outer wall, is a stone curb. The curb is a foot and a half wide and four inches high. Lighting is embedded in these walls. The placement and grading of the walls creates a 'ha ha' effect, a classic landscape design detail that renders the walls invisible with an uninterrupted view from the top of the mound. Though these retaining walls are non-contributing features, this technique helped to preserve a sense of the original topographic character and replaced the temporary ring of "Jersey" concrete barriers that surrounded the knoll from 1998 to 2004.[xxxii]

Light vaults

New lighting of the Washington Monument was designed for the 2004-2005 renovation of the monument grounds. Four light vaults were placed on the grounds, southeast of the monument (northeast of the Sylvan Theatre stage), northeast of the monument (north of the group of willow oaks along 15th Street), northwest of the monument (outside of the retaining walls that encircle the monument), and southwest of the monument (northeast

of the Survey Lodge). The lights are raised on a platform approximately 15 feet off the ground. Another pole raised an additional 10-12 feet above the lights is topped by a security camera.[xxxiii]

Temporary structure (refreshments/gifts) at 14th and Madison

A steel structure with a blue canopy was erected in 2004 and stands near the corner of 15th Street and Madison Drive. Within the canopy, which measures 50-60 feet long and 25-30 feet wide, a frame building has been built and is used as a refreshment stand and souvenir shop. The frame building is 35-40 feet long and 15-20 feet wide. (Both the building and the canopy will be taken down when construction of the National Museum of African American History and Culture begins in 2012).[xxxiv] The blue canopy was destroyed in a severe windstorm in December, 2009.

National Museum of African American History and Culture

The NMAAHC, established in Public Law 108-184, is planned to occupy the "five acre plot of land at the southwest corner of 14th Street and Constitution Avenue… chosen by the Smithsonian's Board of Regents" on January 30, 2006. Construction is slated to begin in January, 2012.[xxxv] This property was transferred from the NPS to the Smithsonian Institute May 30, 2007.[xxxvi]

Extension of the Potomac Park Levee

Additional significant changes will occur to the northwest monument grounds as a result of the construction of a levee closure system for the Potomac Park Levee. The levee runs parallel to the north boundary of the Lincoln Reflecting Pool to the west side of 17th Street and extends into the monument grounds on the east side of 17th Street. Two new walls will be constructed on either side of the closure point south of the intersection of 17th Street and Constitution Ave., NW. Construction began in 2011 and is scheduled to be completed by 2013.

World War II Memorial (off-site)

The World War II Memorial was completed and opened to the public in April, 2004. It was dedicated on May 29 of the same year. The placement of this memorial between the Washington Monument and the Lincoln Memorial has greatly increased visitation along the east-west axis through the monument grounds.

Circulation (*Figure ES-1)*

The 16th Street Parking Lot

The 16th Street parking lot, which had followed the alignment of the old street, was removed during the monument grounds improvements during 2004-2005. Evidence of 16th Street and the parking lot is extant; curbs, a pedestrian crossing, and traffic lights remain along the former Constitution Avenue entrance to the grounds, but there is no trace on the grounds.[xxxvii]

Raoul Wallenberg Place (formerly 15th Street)

The portion of 15th Street between Independence Avenue SW and Maine Avenue SW was re-named "Raoul Wallenberg Place" in honor of Raoul Wallenberg by Act of Congress on December 19, 1985. Although construction on Raoul Wallenberg Place was part of the 1997 reconfiguration of 15th Street, Madison Drive, and Jefferson Drive, the street was not altered from its previous configuration. New sidewalks were built and a bus drop-off was constructed. Traffic patterns were altered at the intersection of Raoul Wallenberg Place and Maine Avenue, as a new right turn lane from Raoul Wallenberg Place onto westbound Maine Avenue created a triangular pedestrian island. Other islands were created at this intersection to allow better pedestrian traffic flow from one side of the street to the other.[xxxviii]

Independence and Maine Avenues

Construction of the Independence Avenue extension through the south monument grounds was completed in 1943, just before the end of the period of significance. A few minor changes have taken place since that time: the access road to the propagating gardens/maintenance grounds along eastbound Independence Avenue was taken out when the remaining propagating garden buildings were removed in 1962; between 1998 and 2000, Independence Avenue was repaved and new granite curbing was installed; and in 2005 new curbs and gutters were built along Independence Avenue, along with repairs to the left lane of the road.[xxxix]

Monument Plaza

The current monument plaza was created as part of the 2004-2005 grounds security improvements. The original size of the plaza was retained, but the concrete and asphalt surface was replaced with the two colors of granite. It is comprised of three concentric circles of lighter granite (Ash Rose), between which the darker colored granite (Mesabi Black) was placed.[xl]

Pedestrian Walkways and Paths

The 2004-2005 grounds security improvements included a new pedestrian circulation plan designed by Olin Partnership in conjunction with the NPS. Most conspicuous is the new system of curvilinear paths associated with the retaining walls that encircle the Washington Monument. Two overlapping twelve-foot wide elliptical paths enclose the monument. The paths allow for pedestrian traffic, but bollards, placed at the four points where paths leading from the corners of the grounds meet, restrict automobile access. Paths from the corners of the site were adjusted; new paths were added and existing paths removed as necessary. All paths maintain the curvilinear configuration characteristic to the site, though the two parallel paths leading between the monument and 17th Street were retained. All paths are constructed of exposed aggregate concrete. Although the historic configuration of pedestrian paths on the grounds has not been preserved, there have been paths on the grounds since the monument was completed in the 1880s. Although the current paths are non-contributing, they retain the curvilinear nature characteristic of historic walks, as well as an orientation toward the monument and are compatible non-contributing. During 2004-2005 improvements, a retaining wall was built around the west side of Monument Lodge addition. When the addition was removed during the 2005-2006 Monument Lodge renovations, the space between the Lodge and the wall became a terrace constructed of the same exposed aggregate concrete used for walks throughout the grounds.[xli]

Vegetation

The defining vegetative feature of the Washington Monument Grounds is the open lawn that defines the ground plane of the site.[xlii]

The Olin Partnership Concept Plan for Vegetation

The Olin Partnership concept plan of 2002 called for 738 trees to be planted in various locations on the Washington Monument Grounds (*Figure ES-12*). As part of the 2004-2005 project to improve the security and accessibility of the Washington Monument and Grounds, Grunley Walsh (GW) contractors planted 100 of the proposed trees (*Figure ES-*

13). Due to a number of contingencies (including poor quality soil delivered by GW, poor storage of the trees before planting, and planting out of season), only 57 of these original 100 trees survived. Since that time, new developments on the monument grounds (primarily the 17th Street levee project; the construction of the National Museum of African American History and Culture; and the need to accommodate special event areas and ball field area) have lowered the number of trees necessary for realizing the intentions of the Olin Plan's design. The NPS estimates planting an additional 631 trees *(Figure ES-14*).[xliii]

Topography

The topography of the Washington Monument Grounds is dominated by the monument mound. The other topographical features, such as the flats, berm, and Potomac Flats continue to emphasize the predominance of the mound on which the Washington Monument sits. These topographical features retain their integrity. Although minor changes have been made since 1943, they have not altered the overall topography of the site.[xliv]

South Monument Grounds/Potomac Flats

No significant changes have been made to the topography of the south grounds since the period of significance.[xlv]

The Berms

During the re-grading of the monument grounds in 2004-2005, other berms were created south and west of the monument retaining wall. The slope of the approximately three-foot berm to the west of the retaining wall is gradual, while the berm to the south is more pronounced, rising seven to ten feet at its highest point. Both serve to mask the retaining wall from views from the south and west monument grounds.[xlvi]

The Mound / the Knoll

The monument mound remained unchanged until 1984, when it was filled and graded in preparation for upcoming construction projects to improve access walks to the Monument. 23,000 cubic yards of earth were added to the mound.

Washington Monument grounds security improvements that took place from 2004-2005 included filling and re-grading the monument mound. The grading was required for the new retaining walls and paths and to provide access to the monument for all visitors. The placement and grading of the walls creates a 'ha ha' effect, a classic landscape design

detail that renders the walls invisible with an uninterrupted view from the top of the mound. This technique helped to preserve a sense of the original topographic character. Grading preserved the 'pronounced slope of the knoll from which the monument rises while smoothing the small surface variations to allow for the even rise of the retaining walls and paths as they ascend the slope to the monument plaza. A comparison of the [former and current] cross-site grading slopes indicates some increased uniformity in the knoll, although the pastoral and variegated character of the slope across the grounds is retained (Washington Monument Grounds Final Site Development Plans, 6)'.[xlvii]

Potomac Park Levee

The eastern end of the levee remains a feature of the northwest monument grounds, though levee improvements may change the feature and the topography of the grounds around it. Since only a small portion of the levee is located on the monument grounds, and the majority of the levee is located in Constitution Gardens, it is listed as a contributing feature of Constitution Gardens and not the Washington Monument Grounds.[xlviii]

Small Scale Features

Benches

Benches remain on the monument grounds. A few cast-iron-and–wood-slat benches still remain on the monument grounds along Constitution Avenue, Raoul Wallenberg Place, near the Survey Lodge, and along Jefferson Drive. In other areas, new benches have been added since the period of significance. Cast-iron-and-wood-slat benches on the monument plaza were replaced in 1963 with concrete-and-wood-slat benches. These benches were then replaced in 2002 with backless benches composed of recycled plastic. When the entire plaza was improved in 2004-2005, eight curved, backless benches of white marble were installed along the outer edge of the plaza. A similar marble bench was placed just east of the Monument Lodge entrance. Concrete-and-wood slat benches are currently only located around the refreshment kiosk along the Tidal Basin. Granite benches were added to the German-American Friendship Gardens in 1987-88. [xlix]

Lighting

Olmsted lighting located near the 16th Street parking lot and on Madison and Jefferson Drives were removed from the monument grounds during the 2004-05 grounds security

improvements. The original floodlights used to light the monument plaza were replaced in 1958 with underground vaults placed on the four sides of the monument, floodlights located a few feet from the monument's base, and spotlights mounted on elevated concrete piers. These features were removed in 2004-05, when grounds improvements included a new lighting plan including in-grade recessed uplights set into the granite plaza to illuminate the monument's base and flagpoles, high intensity floodlights mounted within recessed vaults to light the monument shaft, and elevated spotlights to illuminate the monument's peak. Lighting was added along the retaining walls to light paths leading to the monument plaza, as well as uplights installed along the front of the Monument Lodge.[l]

Plaques

The Dedication plaque was removed from the monument's base during the 2004-05 grounds improvements. It was cleaned and restored in 2006 and is currently in storage at the Museum Resource Center (MRCE).[li] It will be re-installed on the monument grounds once compliance and a design plan have been completed.[lii] Other plaques added to the site in the late 20th century include the George Washington granite panel, removed during 2004-05 grounds improvements, and the 100th Anniversary panel, which is set into the southern-most walk connecting 17th Street to the Washington Monument.[liii]

Spatial Organization

Although the center point of the cross-axis was demarcated by the Jefferson Pier in 1804, the completed monument was built 371.6 feet east and 123.17 feet south of it, due to the pier's close proximity to the Potomac River and marshy terrain.[liv]

The south monument grounds (located south of Independence Avenue) have served as a continuation of park ground, as well as a connection between the Washington Monument and Thomas Jefferson Memorial and Tidal Basin. While much of this area served a utilitarian purpose during most of the period of significance, once the south grounds were expanded from land reclaimed from the Potomac in 1899 and 1901, it also served a park function. With the completion of the Independence Avenue extension project in 1943, a connection between the 14th Street Bridge and Arlington Memorial Bridge was created. The spatial orientation of this portion of the grounds is largely dominated by the road system that runs through it.[lv]

VISUAL DOCUMENTATION

Below is the table of contents for the images, drawings, and maps that follow this ES. This visual documentation is from the 2009 CLI and represents the most current documentation of existing conditions at the Washington Monument Grounds.

Photographs

Figure ES-1. 2009 CLI site plan.
Figure ES-2. 2009 CLI existing conditions circulation map.
Figure ES-3. 2009 CLI vegetation map 1.
Figure ES-4. 2009 CLI vegetation map 2.
Figure ES-5. 1903 photograph of the new roadway, power house, and propagating gardens.
Figure ES-6. 1899 photograph of the south monument grounds.
Figure ES-7. 2009 photograph of the north vista to the White House.
Figure ES-8. 2009 photograph of the south vista to the Jefferson Memorial.
Figure ES-9. 2009 photograph of the west vista to the Lincoln Memorial.
Figure ES-10. 2009 photograph of the east vista to the Capitol Building.
Figure ES-11. 2009 aerial photograph of the northwest monument grounds.
Figure ES-12. 2009 aerial photograph of the northeast monument grounds
Figure ES-13. 2009 aerial photograph of the southwest monument grounds.
Figure ES-14. 2009 photograph of the Washington Monument from the northwest.
Figure ES-15. 2009 photograph of the historic mulberry trees located southwest of the Washington Monument.
Figure ES-16. 2009 photograph of the Bulfinch gateposts at the southwest corner of 15th Street and Constitution Avenue.
Figure ES-17. 2009 photograph of the stone-lined drainage ditch along the Survey Lodge service drive.
Figure ES-18. 2009 photograph of the temporary structure at 14th and Madison.
Figure ES-19. 2009 photograph of the Monument Lodge with the Washington Monument in background.
Figure ES-20. 2009 photograph of the Monument Knoll granite retaining wall.
Figure ES-21. 2009 photograph of the front façade of Sylvan Theater.
Figure ES-22. 2009 photograph of the World War II Memorial with the Washington Monument in the background.
Figure ES-23. 2009 photograph of visitor screening facility at monument base.
Figure ES-24. 2009 photograph of light vaults on Monument Plaza with views of the ring of flags and granite benches in the background.
Figure ES-25. 2009 photograph of Monument Plaza with views of the ring of flags and granite benches.
Figure ES-26. 2009 photograph of the Tidal Basin seawall along the southern edge of the Washington Monument Grounds.
Figure ES-27. 2009 photograph of the Tidal Basin Seawall.
Figure ES-28. 2009 photograph of Tidal Basin and boat dock.
Figure ES-29. 2009 photograph of boat dock gates.

Figure ES-30. 2009 photograph of elms along East Basin Drive.
Figure ES-31. 2009 photograph of 15th Street Berm.
Figure ES-32. 2009 photograph of 15th Street Berm, detail.
Figure ES-33. 2009 photograph of elm along Raoul Wallenberg Place.
Figure ES-34. 2009 photograph of trees along Independence and Jefferson Drives.
Figure ES-35. 2009 photograph of Monument Lodge plantings.
Figure ES-36. 2009 photograph of Monument Lodge plantings, detail.
Figure ES-37. 2009 photograph of the ovular comfort station.
Figure ES-38. 2009 aerial photograph of comfort station showing ovular shape. Note Sylvan Theater in foreground.

Maps

Map ES-1. 2002 Olin concept plan for vegetation.
Map ES-2. 2004 Grunley Walsh's partial implementation of the Olin concept plan for vegetation.
Map ES-3. 2011 Revised Olin concept plan for vegetation.

ENDNOTES

[i] Jennifer Talken-Spaulding, "Project: Revision and Completion of Washington Monument Cultural Landscape Report," 2 November 2007, located at O:\Res Mgt\Cultural\CLI\WAMO draft CLR (accessed 9 June 2011), 1.
[ii] Letter from Joseph Lawler (Regional Director, National Capital Region, National Park Service) to Lisa Burcham (District of Columbia Historic Preservation Officer), 20 May 2003, unarchived internal correspondence located at O:\Res Mgt\Cultural\CLI\WAMO draft CLR (accessed 9 June 2011), 4.
[iii] This collaboration is noted in the letter from Lisa Burcham (District of Columbia Historic Preservation Officer) to Joseph Lawler (Regional Director, National Capital Region, National Park Service), 21 May 2003, unarchived internal correspondence located at O:\Res Mgt\Cultural\CLI\WAMO draft CLR (accessed 9 June 2011), 1; The character areas are discussed in the letter from Joseph Lawler (Regional Director, National Capital Region, National Park Service) to Lisa Burcham (District of Columbia Historic Preservation Officer), 20 May 2003, unarchived internal correspondence located at O:\Res Mgt\Cultural\CLI\WAMO draft CLR (accessed 9 June 2011), 2-3.
[iv] National Park Service, *Cultural Landscape Inventory: Washington Monument Grounds and Washington Monument* (Washington: National Park Service, 2009), 71.
[v] Louis Berger Group, Inc., *Final Report: Phase IA Archaeological Investigation for the Potomac Park Levee*. Unpublished report (January 2009), and Louis Berger Group, Inc., *Draft Report: Phase II Archaeological Investigation for the National Museum of African American History and Culture*. Unpublished report (December, 2007).
[vi] Louis Berger Group, Inc., and Robinson & Associates, Inc., *Preliminary Archaeological and Draft Historical Preservation Report*. Unpublished report. 2009), i. See also Louis Berger Group, Inc., *Draft Report: Phase II Archaeological Investigation for the National Museum of African American History and Culture* (Unpublished report. 2007).
[vii] Berger and Robinson, *Preliminary Report*, i.
[viii] Ibid.

[ix] Berger, *Final Report: Phase IA*, i.
[x] Ibid.
[xi] Ibid., 38.
[xii] Ibid., 38.
[xiii] National Park Service, *Cultural Landscape Inventory: Washington Monument Grounds and Washington Monument* (Washington: National Park Service, 2009), 67.
[xiv] Ibid., 71.
[xv] Ibid., 86.
[xvi] Ibid., 112.
[xvii] Ibid., 98.
[xviii] Ibid., 88, 73.
[xix] Ibid., 84-75.
[xx] Ibid., 87.
[xxi] Ibid., 88.
[xxii] Ibid., 99.
[xxiii] Ibid., 73.
[xxiv] Ibid., 77; Steve Lorenzetti, et. al, "DRAFT: Cultural Landscape Report: Washington Monument Grounds," March 2008, 3.18; National Park Service, *Cultural Landscape Inventory: Constitution Gardens* (Washington: National Park Service, 1998).
[xxv] NPS, *CLI: WMG and WM*, 76.
[xxvi] Ibid.
[xxvii] Ibid.
[xxviii] Ibid.
[xxix] Ibid., 77.
[xxx] Ibid.
[xxxi] Ibid.
[xxxii] Ibid., 78.
[xxxiii] Ibid.
[xxxiv] Ibid.
[xxxv] Ibid.
[xxxvi] Sharon C. Park (FIFA Chief of Architectural History and Historic Preservation) to Martha Catlin (Advisory Council on Historic Preservation). 7 June 2007. NPS-NAMA Collection.
[xxxvii] NPS, *CLI: WMG and WM*, 90.
[xxxviii] Ibid., 91.
[xxxix] Ibid.
[xl] Ibid.
[xli] Ibid., 92.
[xlii] Ibid., 97.
[xliii] Alice McLarty, email message to Perry Wheelock (cc: Steve Lorenzetti, Sean Kennealy, Luke Van Belleghem), 30 June 2011.
[xliv] NPS, *CLI: WMG and WM*, 113.
[xlv] Ibid.
[xlvi] Ibid.
[xlvii] Ibid., 112-13.
[xlviii] Ibid., 113.
[xlix] Ibid., 120.
[l] Ibid., 121.
[li] "MRCE" refers to the NPS Regional Museum Resource Center in Landover, MD.
[lii] This will be included in the project to implement a permanent visitor screening facility for visitors to the Washington Monument.
[liii] NPS, *CLI: WMG and WM*, 120.
[liv] Ibid., 115.

[lv] Ibid., 116.

EXECUTIVE SUMMARY

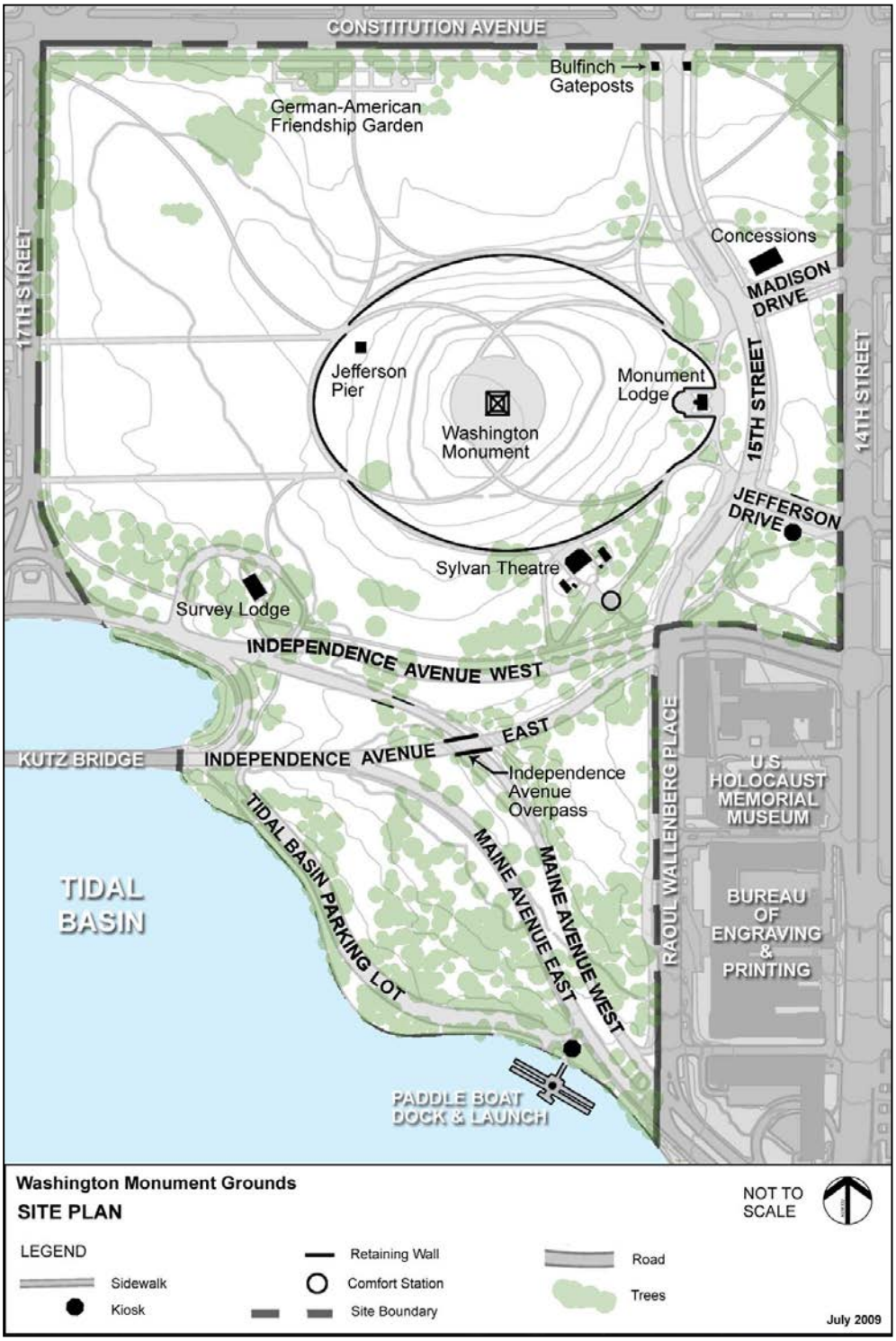


Figure ES-1. 2009 CLI site plan. (WAMO CLI, 2009)

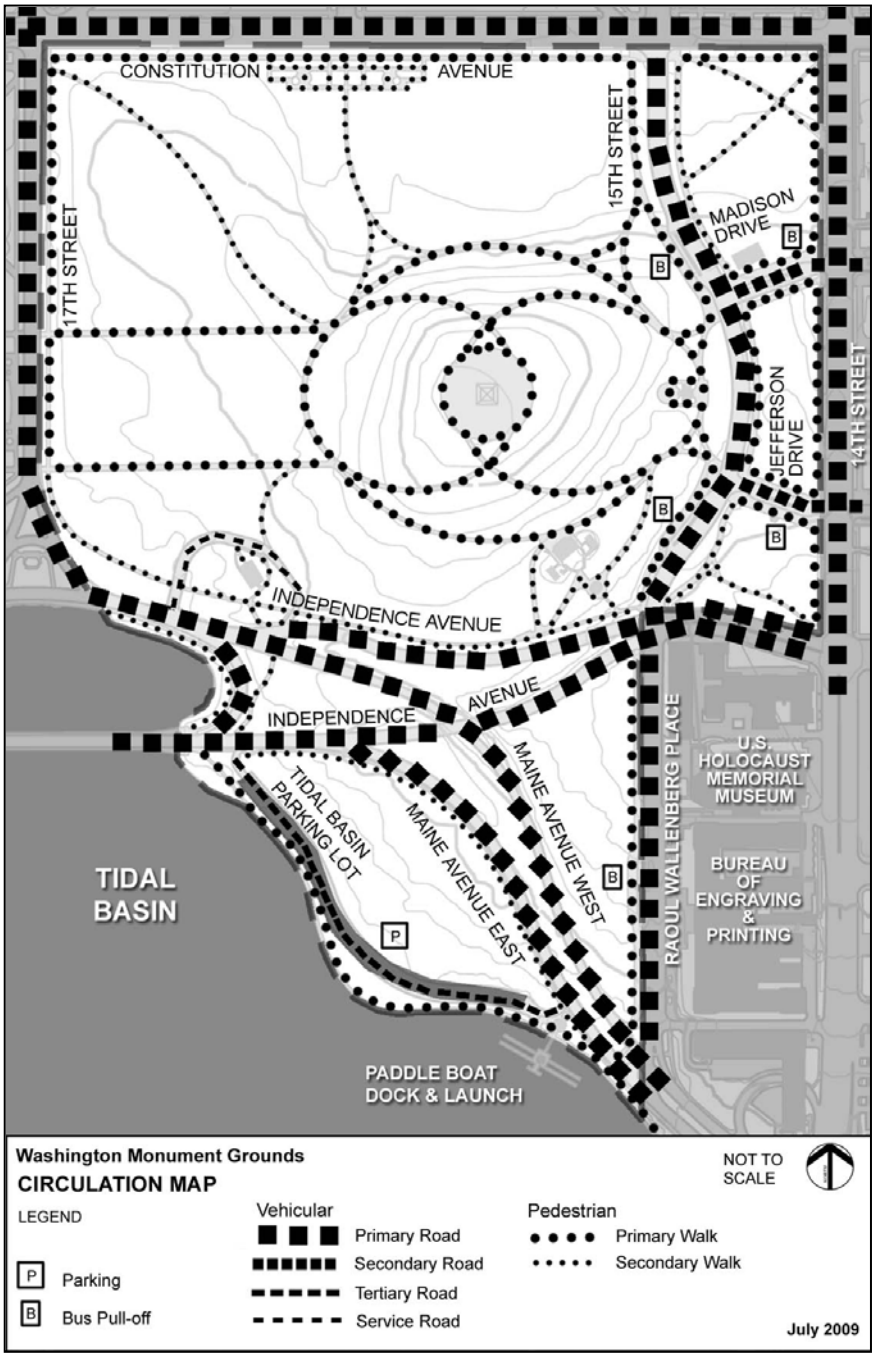


Figure ES-2. 2009 CLI existing conditions circulation map. (WAMO CLI, 2009)

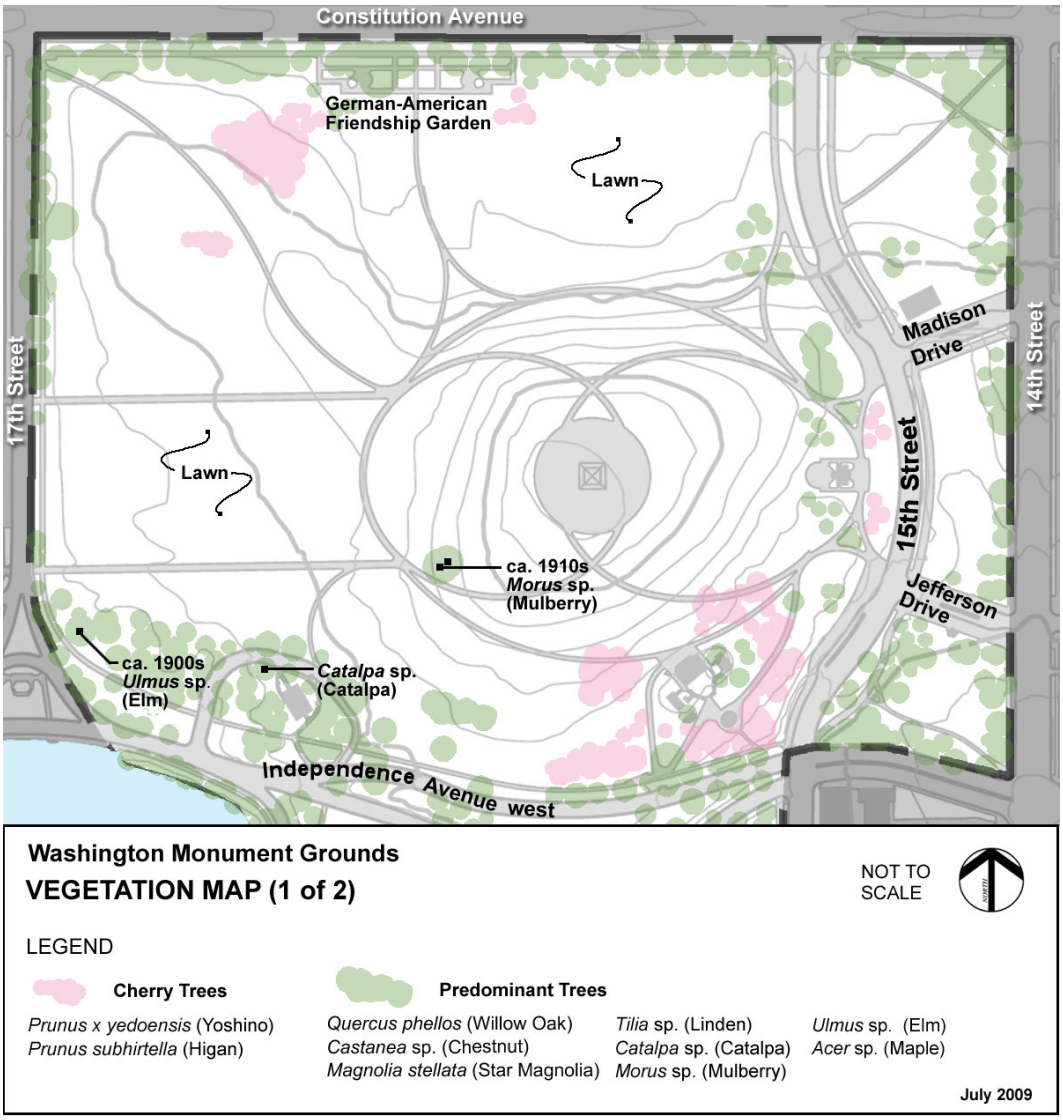


Figure ES-3. 2009 CLI vegetation map 1. (WAMO CLI, 2009)

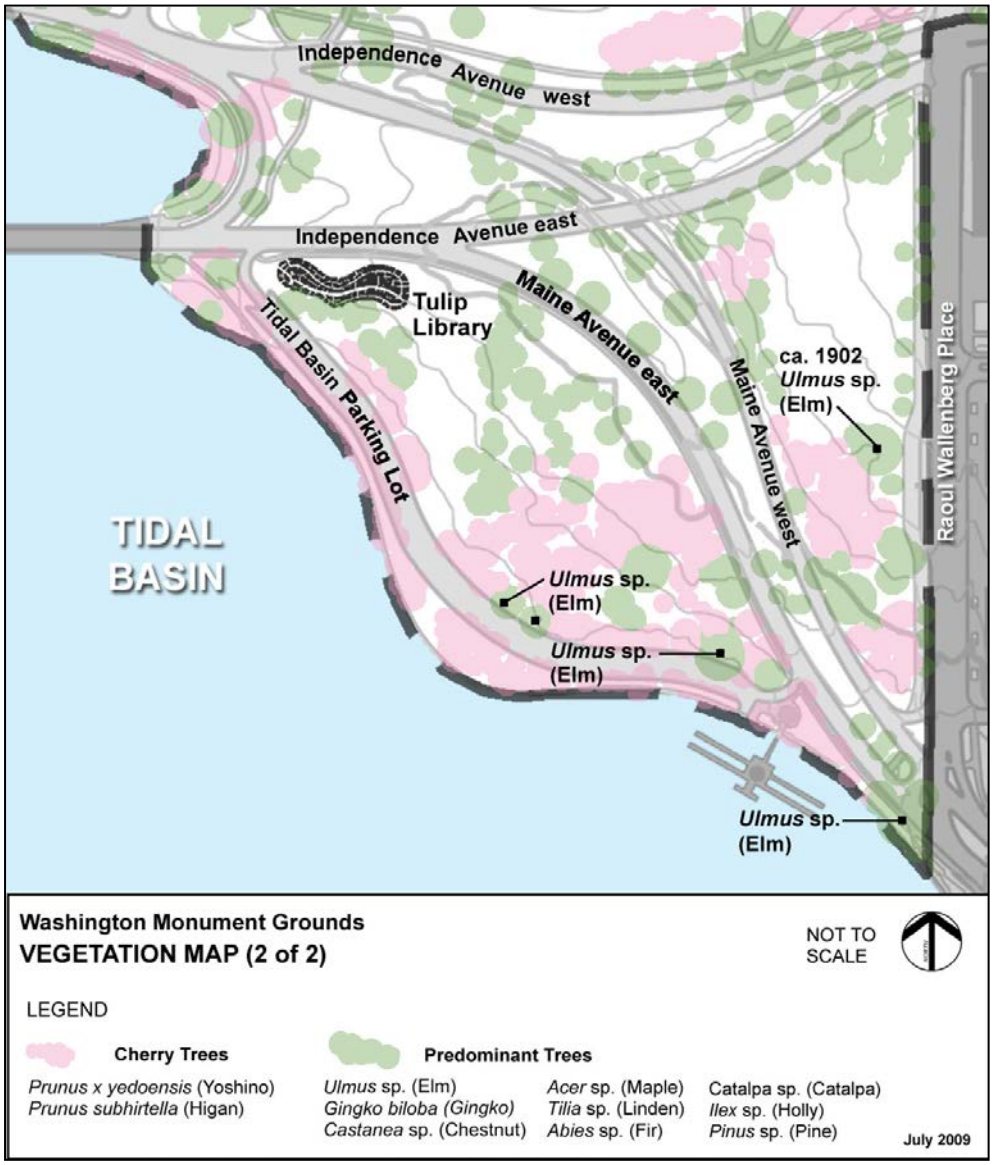


Figure ES-4. 2009 CLI vegetation map 2. (WAMO CLI, 2009)



Figure ES-5. 1903 photograph of the new roadway, power house, and propagating gardens. (WAMO CLI, 2009)

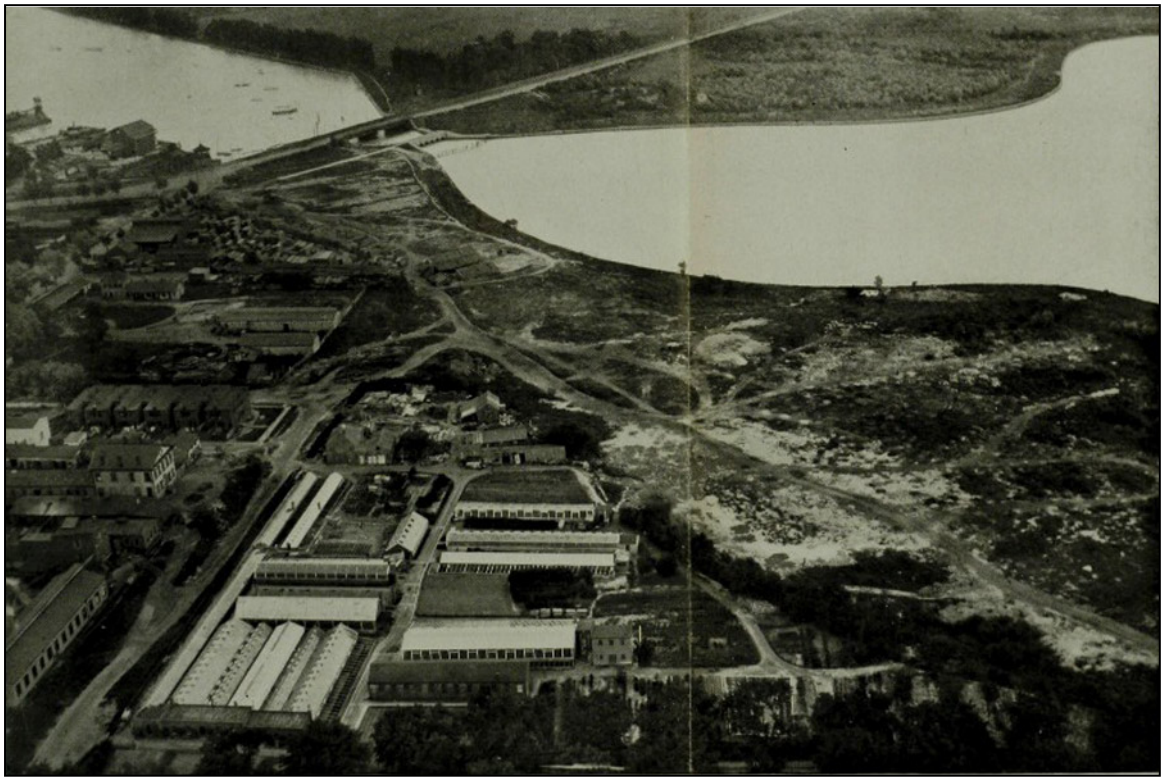


Figure ES-6. 1899 photograph of the south monument grounds. (WAMO CLI, 2009)



Figure ES-7. 2009 photograph of the north vista to the White House. (WAMO CLI, 2009)



Figure ES-8. 2009 photograph of the south vista to the Jefferson Memorial. (WAMO CLI, 2009)



Figure ES-9. 2009 photograph of the west vista to the Lincoln Memorial. (WAMO CLI, 2009)



Figure ES-10. 2009 photograph of the east vista to the Capitol Building. (WAMO CLI, 2009)



Figure ES-11. 2009 aerial photograph of the northwest monument grounds. (WAMO CLI, 2009)



Figure ES-12. 2009 aerial photograph of the northeast monument grounds. (WAMO CLI, 2009)



Figure ES-13. 2009 aerial photograph of the southwest monument grounds. (WAMO CLI, 2009)



Figure ES-14. 2009 photograph of the Washington Monument from the northwest. (WAMO CLI, 2009)



Figure ES-15. 2009 photograph of the historic mulberry trees located southwest of the Washington Monument. (WAMO CLI, 2009)



Figure ES-16. 2009 photograph of the Bulfinch gateposts at the southwest corner of 15th Street and Constitution Avenue. (WAMO CLI, 2009)



Figure ES-17. 2009 photograph of the stone-lined drainage ditch along the Survey Lodge service drive. (WAMO CLI, 2009)



Figure ES-18. 2009 photograph of the temporary structure at 14th and Madison. (WAMO CLI, 2009)



Figure ES-19. 2009 photograph of the Monument Lodge with the Washington Monument in background. (WAMO CLI, 2009)



Figure ES-20. 2009 photograph of the Monument Knoll granite retaining wall. (WAMO CLI, 2009)



Figure ES-21. 2009 photograph of the front façade of Sylvan Theater. (WAMO CLI, 2009)



Figure ES-22. 2009 photograph of the World War II Memorial with the Washington Monument in the background. (WAMO CLI, 2009)



Figure ES-23. 2009 photograph of visitor screening facility at monument base. (WAMO CLI, 2009)



Figure ES-24. 2009 photograph of light vaults on Monument Plaza with views of the ring of flags and granite benches in the background. (WAMO CLI, 2009)



Figure ES-25. 2009 photograph of Monument Plaza with views of the ring of flags and granite benches. (WAMO CLI, 2009)

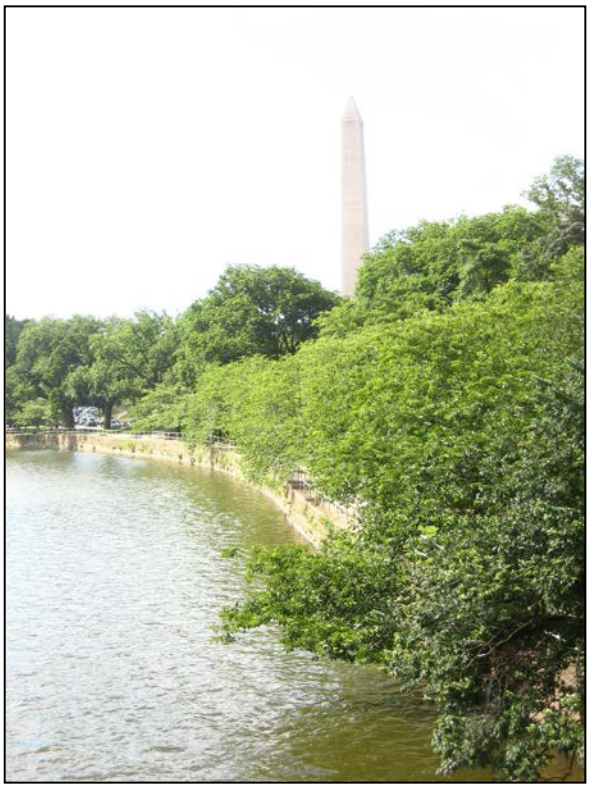


Figure ES-26. 2009 photograph of the Tidal Basin seawall along the southern edge of the Washington Monument Grounds. (WAMO CLI, 2009)



Figure ES-27. 2009 photograph of the Tidal Basin Seawall. (WAMO CLI, 2009)



Figure ES-28. 2009 photograph of Tidal Basin and boat dock. (WAMO CLI, 2009)

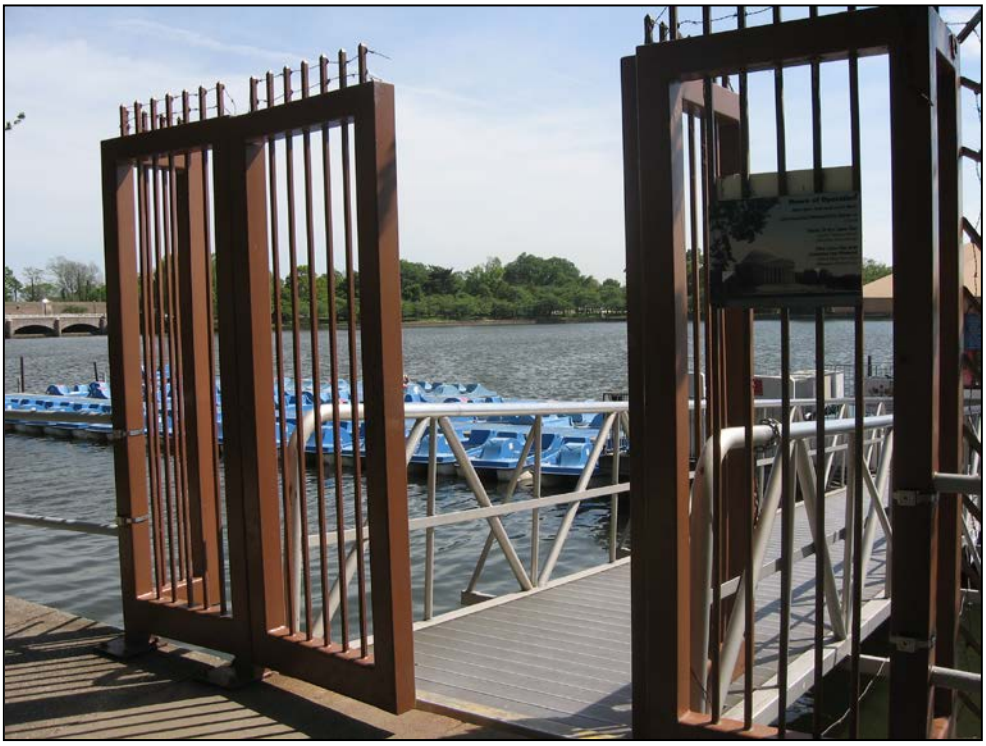


Figure ES-29. 2009 photograph of boat dock gates. (WAMO CLI, 2009)



Figure ES-30. 2009 photograph of elms along East Basin Drive. (WAMO CLI, 2009)



Figure ES-31. 2009 photograph of 15th Street Berm. (WAMO CLI, 2009)



Figure ES-32. 2009 photograph of 15th Street Berm, detail. (WAMO CLI, 2009)



Figure ES-33. 2009 photograph of elms along Raoul Wallenberg Place. (WAMO CLI, 2009)



Figure ES-34. 2009 photograph of trees along Independence and Jefferson Drives. (WAMO CLI, 2009)



Figure ES-35. 2009 photograph of Monument Lodge plantings. (WAMO CLI, 2009)



Figure ES-36. 2009 photograph of Monument Lodge plantings, detail. (WAMO CLI, 2009)



Figure ES-37. 2009 photograph of ovular comfort station. (WAMO CLI, 2009)

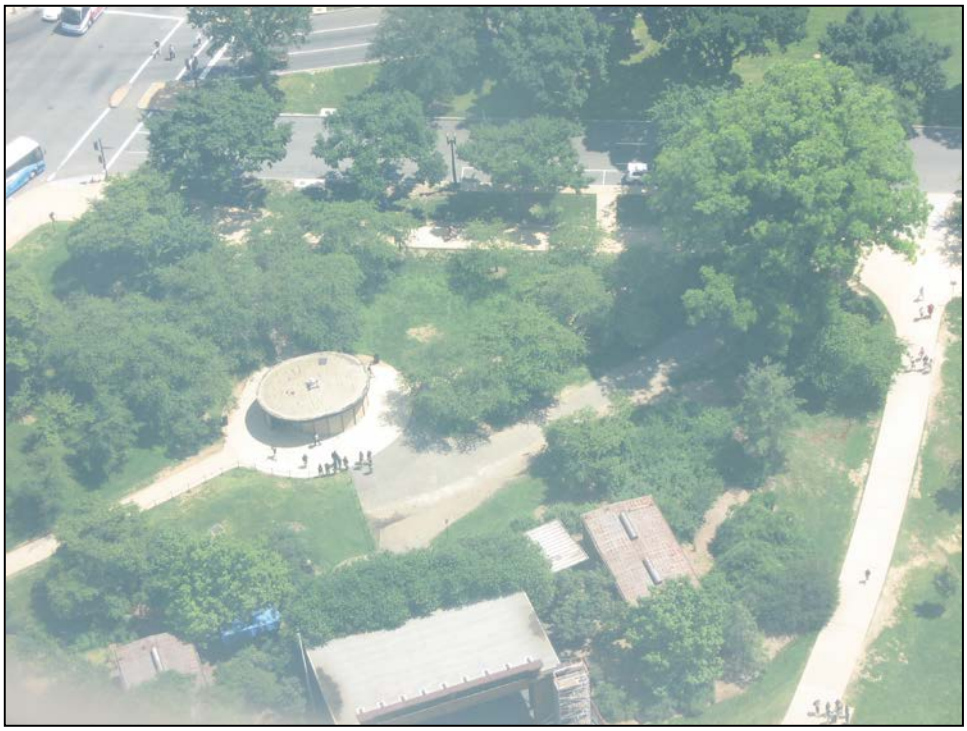


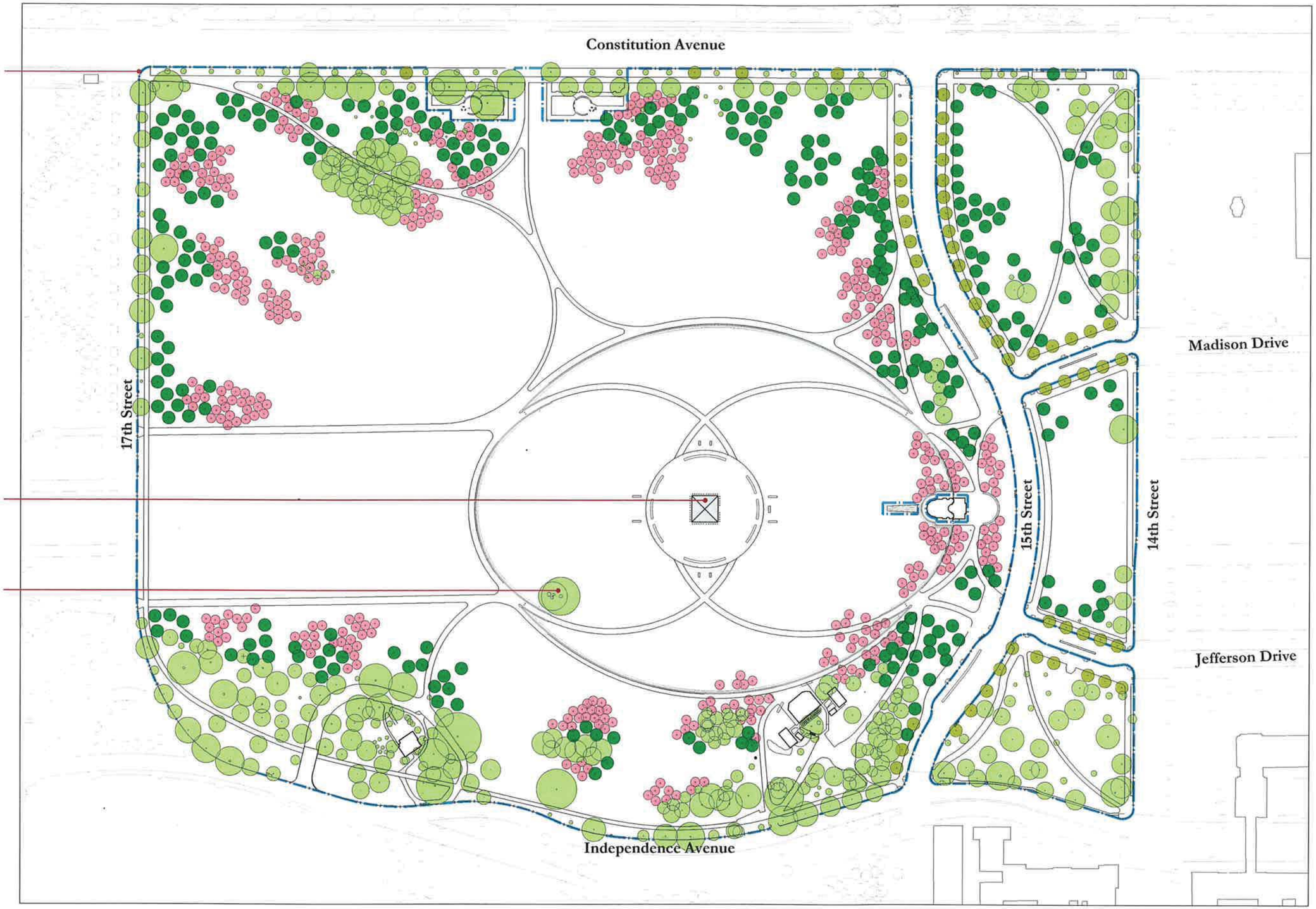
Figure ES-38. 2009 aerial photograph of comfort station showing ovular shape. Note Sylvan Theater in foreground. (WAMO CLI, 2009)

Contract Limit Line

Washington Monument

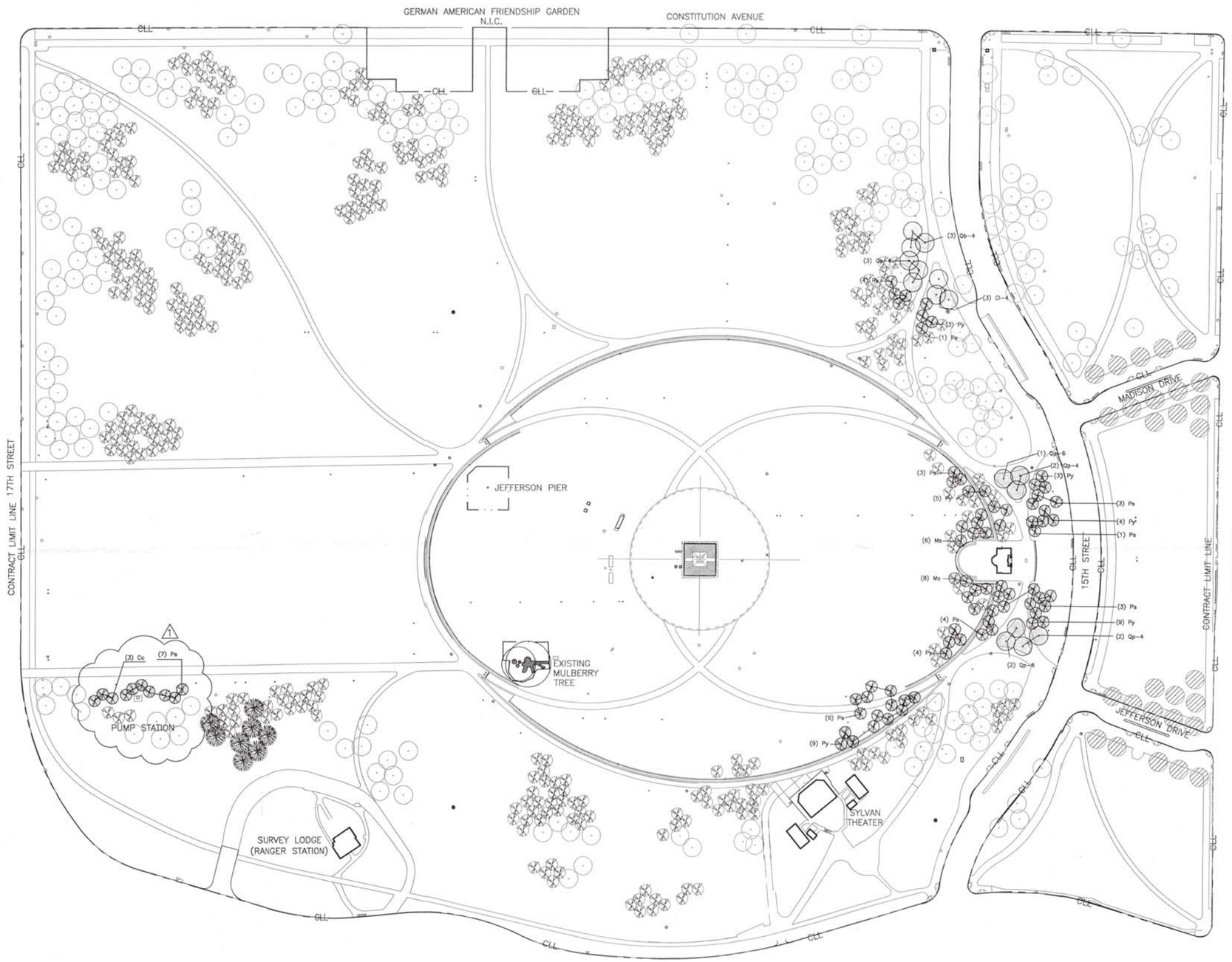
Existing Mulberry Tree

Street Tree
(55 total)
Shade Tree
(294 Total)
Flowering tree
(446 Total)
Existing Tree to Remain
(410 Total)



Tree Planting Plan

North Scale 1"=200'-0"
0 100 200 400



General Notes

1. Existing Site information is provided in electronic files by Wiles Mensch Corporation, dated June 12 2002, updated August 13, 2003.
2. Do not scale off Drawings, use Drawing dimensions only. Verify all dimensions and existing conditions in the field prior to commencement of work. Bring to the attention of Landscape Architect any discrepancies between field conditions and Drawings prior to beginning of work. Field condition discrepancies shall not be used as the basis for change order claims once work has begun.
3. Contractor shall comply with all applicable codes and regulations governing the work.
4. Preserve and protect all existing: structures, furnishings, surface materials, above and below-grade utilities, footings and vegetation indicated to remain within and adjacent to Contract Limit Line during all phases of demolition and construction.
5. The existence and location of each and every underground utility is NOT GUARANTEED and undocumented conditions may exist. Coordinate with Owner for locations of utilities not shown on the base drawing including, but not limited to, high voltage electric, abandoned steam lines, abandoned water lines, telephone, cables, etc. Stake out location of all utilities prior to commencement of work. Any utility that is damaged during site work operations shall be repaired at the Contractor's expense.
6. Maintain vehicular traffic flow to and around the site. Maintain clearly marked pedestrian access to areas on-site not affected by construction activities.
7. Refer to appropriate Drawings for layout information, utility coordination, grading, drainage, site elements, irrigation and planting.
8. Contractor shall adjust all utility existing structures as required to meet proposed grades, including drain inlets, manholes and light pole bases. Contractor shall meet existing grades at all edges of Contract Limit Line.
9. Clean debris from public areas on a daily basis. Owner has the right to have site cleaned, at Contractor's expense, if Contractor fails to comply. All project generated debris shall be removed and properly disposed of according to all applicable regulations.
10. Contractor is responsible for all necessary measures to prevent soil erosion. Approved soil erosion and sedimentation control measures must be installed before site cleaning and site grading operations begin.

Planting Schedule

KEY	QTY.	Botanical Name	Common Name	Size	Comments
		Canopy Trees			
Cl-4	3	*Cladrastis lutea*	Yellowwood	4" cal.	
Qb-4	3	*Quercus bicolor*	Swamp White Oak	4" cal.	
Qp-4	7	*Quercus phellos*	Willow Oak	4" cal.	
Qp-6	3			6" cal.	
Flowering Trees					
Cc	3	*Cercis canadensis*	Redbud	12' ht.	multistems, specimen
Ps	27	*Prunus subhirtella*	Higan Cherry	4" cal.	
Py	42	*Prunus x yedoensis*	Yoshino Cherry	4" cal.	
Ms	12	*Magnolia stellata*	Star Magnolia	12' ht.	multistems, specimen
Total	100				

RECEIVED
APR 28 2005
BY:

Legend

- CLL — Contract Limit Line
- Existing Tree
- Canopy Tree: Phase 1
- Flowering Tree: Phase 1
- Canopy Tree: Phase 2
- Canopy Tree: Phase 3
- Flowering Tree: Phase 3

Scale 1"=100'-0"

100 0 100 200

SCALE OF FEET

GRUNLEY-WALSH
11910 Parklawn Drive, Suite U
Rockville, MD 20852
301-881-8081

Landscape Architect
Olin Partnership
Philadelphia, PA 215-440-0030

Lighting Design
Fisher Marantz Stone
New York, NY 212-691-3020

Signs and Wayfinding
Joel Katz Design Associates
Philadelphia, PA 215-985-4747

Civil Engineering
Wiles Mensch Corporation
Reston, VA 703-391-7600

Structural Engineering
Thornton-Tomasetti-Cutts LLC
Washington, D.C. 202-822-8222

Irrigation Engineering
Lynch and Associates, Ltd.
Beltsville, MD 301-572-7674

Site Electrical Engineering
Joseph R. Loring & Associates
Washington, D.C. 202-296-6583

Blast/Security Consultants
Applied Research Associates, Inc.
Vicksburg, MS 601-638-5401

Soils Engineering
Mueser Rutledge Consulting Engineers
New York, NY 917-339-9300

Soils Scientist
Chemical Consulting of Babylon
Babylon Village, NY 516-587-0832

SEAL

NO.	DATE	REVISION
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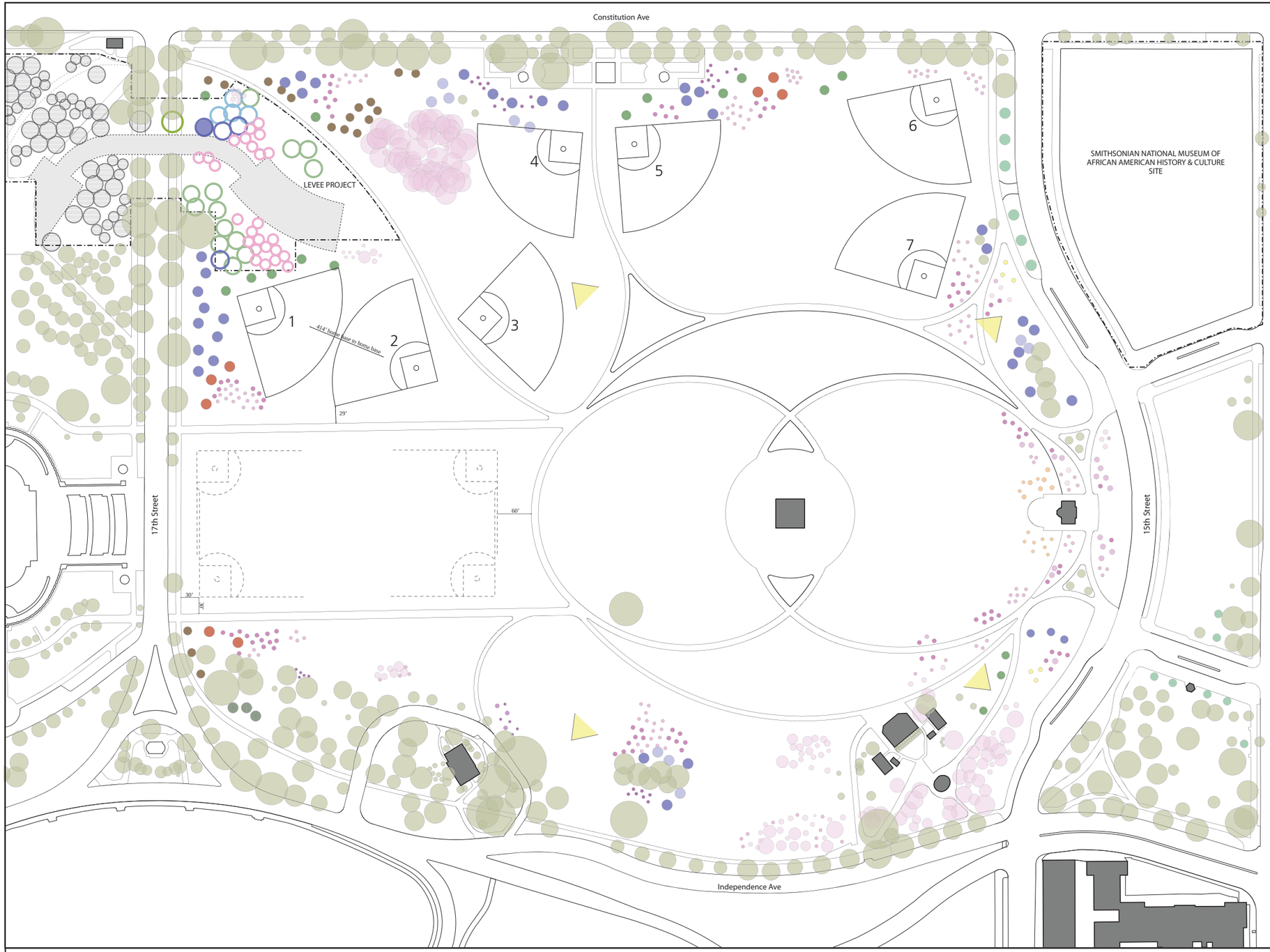
DESIGNED: OP
DRAWN: MC
TECH REVIEW: KJA
DATE: 11th May 2004

SUB SHEET NO. OPSK 17

100% Construction Document Submission
Tree Planting Plan
Tree Phasing Plan -100 Trees
Washington Monument
Physical Security Project
Washington, D.C.

DRAWING NO.
PKG NO.
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Legend :

Exisiting Trees

Shade Tree	
Cercis canadensis	Redbud
Prunus subhirtella 'Autumnalis'	Higan Cherry
Prunus x yedoensis	Yoshino Cherry

Phase II Implementation

		Qty
Cercis canadensis	Redbud	33
Cladrastis lutea	Yellowwood	6
Liriodendron tulipifera	Tulip Tree	14
Magnoila stellata	Star Magnolia	11
Nyssa sylvatica	Blackgum	8
Prunus subhirtella 'Autumnalis'	Higan Cherry	109
Prunus x yedoensis	Yoshino Cherry	128
Quercus alba	White Oak	10
Quercus phellos	Willow Oak	38
Taxodium distichum	Baldcypress	3
Tilia americana 'Redmond'	American Linden	18
Ulmus americana 'Liberty'	American Elm	7

Levee Planting Plan

Prunus x yedoensis	Yoshino Cherry
Quercus bicolor	Swamp White Oak
Quercus phellos	Willow Oak
Tilia americana	American Linden
Ulmus americana 'Valley Forge'	American Elm
Levee Project Trees West of 17th	

Symbols

No Plant Zone
LOD
Baseball Field
Spotlights

WASHINGTON MONUMENT GROUNDS

OLIN PLANTING PLAN PHASE II & LEVEE IMPLEMENTATION

NATIONAL MALL & MEMORIAL PARKS
NATIONAL PARK SERVICE
WASHINGTON, DC

0 50 100 200 300 Feet

DESIGNED:
DRAWN: LV
APPROVED: **DRAFT**
DATE: 05/21/2012

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Chapter One

Administrative Data

CHAPTER ONE

ADMINISTRATIVE DATA

INTRODUCTION

The Washington Monument, recognized worldwide as an American icon, stands proudly in Washington, D.C., as a tribute to the nation's first president. In a city replete with impressive buildings and memorials, the monument's obelisk rises above its neighbors, distinct in its height and simplicity. Arguably the most prominent structure in the city, if not the region, the National Park Service (NPS) became increasingly concerned for its safety following the 1993 attacks on the World Trade Center; the 1995 Oklahoma City bombing of the Murtha Building; the 1998 bombing of U.S. embassies in Kenya and Tanzania; and the 2001 attacks on the World Trade Center and the Pentagon. Considering the monument to be a prime target for potential terrorist attack, the NPS addressed the immediate security by installing a ring of concrete Jersey barriers to prevent vehicular attack. In the fall of 2001, the NPS constructed an interim visitor screening facility at the monument's entrance to address the possibility of a hostile takeover of the structure itself. In addition, the U.S. Park Police began to station officers at the site twenty-four hours a day, seven days a week. While the concrete barriers, screening facility, and increased security presence met basic deterrent requirements, these measures also obstructed important vistas and complicated circulation around the monument. The NPS thus sought to replace the temporary measures with more permanent solutions to enhance security.

In November 2001, the NPS initiated a design process to establish permanent security improvements to protect the Washington Monument and its visitors. They also sought to improve the visitor experience, continue to encourage public activities on the grounds, preserve the cultural landscape and monument structure, and improve accessibility. As part of the process, the NPS engaged John Milner Associates, Inc. (JMA) as subconsultants to Grunley Walsh, to prepare a Historic Structure Report (HSR) and a Cultural Landscape Report (CLR) for the Washington Monument Grounds that would allow the NPS to evaluate proposed security improvements in the broader context of preserving the site's historical integrity.

SCOPE OF WORK

CLRs are the NPS's primary guide for treatment and use of a cultural landscape. A CLR documents and evaluates the character-defining features, materials, and qualities that make a landscape eligible for the National Register of Historic Places. It analyzes the landscape's development and evolution, modification, materials, construction techniques, geographical context, and use over time. CLRs are generally intended to provide a synthetic and cohesive view of a site's historic and existing features through comprehensive documentation, analysis,

and evaluation. As contributors of knowledge to the NPS decision-making process, CLRs often subsequently provide carefully considered landscape treatment recommendations. While CLRs vary in their emphasis and level of investigation, they are typically interdisciplinary in nature, drawing on information developed by historians, landscape architects, ecologists, botanists, architects, archeologists, as well as other project-specific disciplines. The level of investigation conducted for each individual CLR depends on many factors, potentially including the historical significance and integrity of the site, identified management objectives, past documentation efforts, and landscape alterations or changes under consideration by the owner.

Typically, CLRs consist of three parts:

- Part I includes a site physical history, existing conditions documentation, comparative analysis of historic and existing conditions, and National Register-level significance evaluation and integrity assessment.

- Part II presents a treatment plan based on the information developed in Part I and on any identified management goals for the site.

- Part III conveys landscape treatments.

This report constitutes Part I of a CLR for the Washington Monument Grounds. It has been prepared in accordance with the scope of work provided by the NPS. The specific work elements called for in the project scope of work are as follows:

1. Prepare a written narrative of the landscape illustrated by photographs (historic and/or existing), maps, and drawings. Describe as appropriate the historic context, design intent, primary design principles, key developments, physical relationships, patterns, features, and important individuals or events. Focus on describing the physical evolution of the site, not on social history. Conduct additional historical research to fill gaps in existing information. Include a brief historical context for each major period of development, from pre-design to the present; a description of the chronological development and evolution of the physical landscape; and a description of the layout, natural systems, spatial organization, land use, circulation, vegetation, buildings and structures, and small-scale features associated with each major period.

2. Produce historical base maps of the landscape that depict documented historic site conditions at critical periods in the site's evolution, including site topography, as known, buildings, property lines, vegetation, and other landscape features. Make use of existing historical maps for the purpose of representing a specific time period in the report.

3. Prepare a written narrative describing existing conditions and the use of the natural and man-made elements in the landscape consistent with a model provided by the NPS (see the Dumbarton Oaks CLR). Discuss landscape features both individually and relationally as the features connect with one another and the overall landscape (i.e. access, physical connections, and visual linkages). Supplement the narrative with photographs and

inventory maps as necessary to illustrate the current condition and character of the existing landscape and landscape features.

4. Produce a scaled site plan depicting all existing natural and man-made landscape features within the project area. Include property boundaries, topography, buildings, roads, walkways, small-scale features, and significant existing plant species.

5. Provide an analytical correlation between the data obtained from historical research and field surveys to: determine the integrity of existing landscape and landscape features compared to the historic landscape and landscape features; and identify landscape characteristics and develop a list of contributing features of the historic landscape. Supplement the narrative with graphic representation—including notes, diagrams, and photographs, as necessary—illustrating the relationship between the historic and existing landscape and landscape features, to supplement the analysis narrative.

6. Identify the appropriate period(s) of significance for the monument grounds, and evaluate the significance and integrity of the existing landscape according to the National Register criteria for assessing historic landscapes.

7. Define character areas—the physical qualities of the monument grounds—and the type and concentration of cultural resources, based on the existing condition of the characteristics and features that define and illustrate the significance of the landscape. Supplement the narrative with a plan to indicate the character area boundaries.

8. Define management zones—the type or degree of historical integrity within a landscape—in collaboration with park management for areas when there is a need to develop a range of treatment strategies for individual features or areas within a single property, such as when a landscape contains features with different levels of integrity and historic significance related to more then one period. Provide a plan to specify the management zone boundaries. Prepare this information in accordance with the model provided by the NPS (see Dumbarton Oaks CLR).

LOCATION AND DESCRIPTION OF PROPERTY

The Washington Monument Grounds are administered by the NPS as part of National Mall and Memorial Parks (NAMA). The site is located within the city of Washington, D.C. (*figures 1-1 and 1-2*) The grounds are typically defined as District Reservation No. 2, a roughly 106-acre area bounded by 14th Street on the east, Constitution Avenue on the north, 17th Street on the west, and the Tidal Basin on the south. Because appropriate base mapping was not available to the project team for the area to the south of Independence Avenue, that portion of Reservation No. 2 has been excluded from existing conditions documentation and analysis.[1] As defined in 2003, the project area extends over approximately 75 acres within the area bounded by 14th and 17th Streets, and Constitution and Independence Avenues.

[1] This area is documented in the 2009 CLI and the Executive Summary of this report.

Views and vistas extend beyond the boundaries of the project area to the U.S. Capitol, Lincoln and Jefferson Memorials, and the White House. These views are integral to understanding the monument grounds, and have been considered in site documentation for this project.

INVESTIGATION METHODOLOGY

This CLR has been prepared in accordance with the guidance offered in the most recent versions of various federal standards documents, many of which are cited for their relevance in the scope of work for the project, as follows:

- NPS *Director's Order Number 28: Cultural Resources Management Guideline*s
- *Secretary of the Interior's Standards for the Treatment of Historic Properties* (1995) with *Guidelines for the Treatment of Cultural Landscapes* (1996)
- NPS *Guide to Cultural Landscape Reports: Contents, Process, and Techniques* (1998)
- *Uniform Federal Accessibility Standards* (UFAS) or the *Americans with Disabilities Act Accessibility Guidelines* (ADAAG), whichever provides greater accessibility
- *NPS 77: Natural Resources Management Guidelines*
- NPS *Guiding Principles of Sustainable Design*
- *Director's Order Number 10A: Standards for Design and Construction*
- National Register Bulletin 15: *How to Apply the National Register Criteria for Evaluation*
- National Register Bulletin 18: *Guidelines for Documenting and Evaluating Designed Historic Landscapes*
- *Chicago Manual of Style*, 14th edition

The CLRs for the Lincoln Memorial and Dumbarton Oaks, both prepared by the NPS, have also served as models for the level of investigation included in the CLR for the monument grounds. The methodology used by CLR team members in preparing each component of this study is described in detail below.

PROJECT START-UP METHODOLOGY

Team members representing Grunley-Walsh, the NPS, and JMA, met in the Alexandria offices of JMA on February 13, 2003, to discuss the project, its scope, and administrative procedures specific to preparing the CLR.

HISTORICAL RESEARCH METHODOLOGY

Research for this project was conducted in two phases. The first effort was undertaken by Oehrlein & Associates Architects in association with Robinson & Associates during spring/summer 2002. JMA conducted the second phase in 2003, building upon the first phase.

Historic research was undertaken simultaneously for both the HSR and CLR. The first effort involved review and consolidation of materials the NPS provided to Oehrlein & Associates Architects and Robinson & Associates. These materials were supplemented with additional investigation and online research conducted in the Denver Service Center Technical Information Center archives; NPS files, electronic drawing files, and digital photographs; and various repositories in the Washington, D.C., metropolitan area: the Library of Congress (Prints and Photographs Division); the Martin Luther King, Jr., Memorial Library (Washingtoniana Division); the National Archives and Records Administration—Washington, DC (NARA—DC); the National Archives and Records Administration—College Park (NARA—CP; Cartographic Division; Still Pictures Division); the Smithsonian Archives (Washington Monument Files); and the Historical Society of the District of Columbia (CHS Photo Collection).

Robinson & Associates reviewed the material collected during these research efforts: full-length monographs, government reports and documents, historic and contemporary maps, drawings, photographs. They then copied or borrowed those sources relevant to the project to create a collection of source material relevant to the site's physical history. JMA began the project in February, 2003, by reviewing the material collected by Robinson & Associates and provided to JMA by the NPS. Project personnel then analyzed this material for its suitability for supporting the development of site history narratives for the HSR and CLR. Each item was reviewed for information relative to the physical development of the project area landscape, and this information was placed within a chronology to establish a basic timeline of the site and its development. This timeline served as the foundation for the site history which makes up Chapter Two.

Limited additional directed research was conducted in April and May, 2003, to answer specific research questions on the development of the monument grounds. This research included a review of contextual sources at the Library of Congress, selected resources, focusing on construction contracts and development of recreation within RG 42 of the National Archives, and annual reports from the Corps of Engineers, Office of Public Buildings and Public Parks, and the NPS available at the Department of Interior Library. Other resources identified during this research effort, including the "Daily Log Book," and "Washington Monument Scrapbook," were also reviewed.

FIELD INVESTIGATION METHODOLOGY

After delays caused by inclement weather, the team conducted initial field investigations during the week of March 10, 2003. JMA project personnel (including Liz Sargent, Andy Wenchel, Rebecca Yamin, Susan Barbera, Sarah Goode, and Matt Whitaker) visited the site on March 10 for orientation. The NPS provided a tour of the monument interior on March 10 and the grounds on March 12. Walking the field in its entirety allowed the team to verify the existing conditions information on the electronic base map provided by the NPS. The project personnel annotated the base map with notes about corrections to be made to the files regarding the site's features,

including their character, materials, and condition. They also photographed site features both in color and in black and white. The location of photographic station points and the direction of the views were noted on the base maps in the field.

MAPPING METHODOLOGY

The NPS provided JMA with a survey of the monument grounds prepared by the Wiles Mensch Corporation in 2002, using a previous survey by Dewberry and Davis. The survey was provided as an electronic file for use by the team in preparing maps and plans in AutoCADD. The survey extended between 17th Street to the west, 14th Street to the east, Constitution Avenue to the north, and Independence Avenue to the south. JMA updated the electronic files with information collected during March 2003 field investigations.

EXISTING CONDITIONS DOCUMENTATION METHODOLOGY

The documentation of existing conditions included in Chapter Three was developed through cross-referenced narrative, graphic, and photographic materials, organized in accordance with the framework established in the NPS *Guide to Cultural Landscape Reports; Content, Process, and Techniques* that identifies various landscape characteristics for presenting existing conditions documentation information. The landscape characteristics utilized to describe the grounds include: natural systems, spatial organization, land use, circulation, topography, vegetation, buildings, structures, small-scale features, views and vistas, and archeological resources.

Existing conditions documentation was prepared through the review and compilation of information derived from existing conditions base mapping, field investigations, review of photographs taken in the field, and examination of park planning documents, park files, and NPS reports and planning studies. Photographs of representative landscape features were used to consider and illustrate the various landscape characteristics. These representative photographs support a narrative description of each landscape characteristic and are referenced in the text. A documentation notebook containing all existing conditions photographs, negatives, and photographic station points map was provided to the NPS to supplement the representative photographic coverage included in the report. Black and white photographs of primary landscape features were provided as the archival record of site conditions prior to the implementation of security improvements.

The team also prepared an inventory of existing landscape features based on documentation of the site and an understanding of historic conditions. The inventory was utilized to ensure that each feature was discussed in the text and served as the basis for the comparative analysis of historic and existing conditions.

EVALUATION OF SIGNIFICANCE METHODOLOGY

The Washington Monument is currently listed in the National Register of Historic Places. The 1980 National Register Nomination indicates that the structure is nationally significant for its

architecture and engineering between 1848 and 1889, within the areas of Architecture, Landscape Architecture, Engineering, and Commemoration.

This information, the evaluations provided in the National Register nomination for L'Enfant's Plan for Washington City, and the guidance provided in National Register Bulletins 15 and 18, serve as the basis for the CLR evaluation of significance. The CLR's comprehensive investigation into the significance of the monument landscape suggested additional aspects, areas, and periods of potential significance that merit further evaluation, and possible inclusion in a revised National Register nomination. This supplemental evaluation information was incorporated into the preliminary discussion of significance included in Chapter Four.

COMPARATIVE ANALYSIS METHODOLOGY

To better understand the relationship between the existing park landscape and the character of the landscape during the identified period of significance, the CLR team prepared a comparative analysis of historic and existing landscape conditions. For the most part, the analysis focused on extant features and their dates of origin. The three primary goals of the comparative analysis were to:

1) understand which features survive from the period of significance;

2) establish the basis for an integrity assessment; and

3) provide an understanding of the similarities and differences between historic and existing conditions sufficient to support the development of a well-grounded treatment plan for the cultural landscape.

Through the development of the comparative analysis of historic and existing landscape conditions, contributing, non-contributing, and missing features were identified. Contributing features are resources that survive from the period of significance; non-contributing features originated after the period of significance; and missing features are resources known or thought to have existed during the period of significance that are no longer evident except possibly in the archeological record. Conjectural information was indicated as such within the lists.

ASSESSMENT OF INTEGRITY METHODOLOGY

The CLR summarizes the site's overall integrity and then assesses integrity in accordance with the seven aspects—location, design, setting, materials, workmanship, feeling, and association—described in National Register Bulletin 15: *How to Apply the National Register Criteria for Evaluation*.

MANAGEMENT ZONE IDENTIFICATION METHODOLOGY

Using the character areas identified in the April 2002 Washington Monument Development Concept Plan and the CLR for Dumbarton Oaks as a model, the CLR team identified three management zones within the monument grounds project area. The zones are consistent with the findings of the comparative analysis of landscape characteristics, as well as the significance and

integrity assessments conducted conveyed in the CLR. The management zones indicate areas of similar levels of significance and integrity. Each is tied to a conceptual approach to treatment that recognizes its particular combination of resources, integrity, and current and planned future use. These zones also reflect the concerns about management and specific resource needs that members of the NPS resource management team conveyed to the CLR team.

PROJECT A/E STAFF

The A/E staff involved in the preparation of the CLR included:

JOHN MILNER ASSOCIATES, INC., CHARLOTTESVILLE, VIRGINIA

- Rob McGinnis, Project Manager
- Liz Sargent, Project Historical Landscape Architect
- Matt Whitaker, Project Designer
- Adriane Fowler, Designer
- Amy Wells, Desktop Publishing

JOHN MILNER ASSOCIATES, INC., ALEXANDRIA, VIRGINIA

- John Mott, Project Director
- Sarah Goode, Historian
- Andy Wenchel, Landscape Architect/Architect
- Susan Barbera, CAD Operator

JOHN MILNER ASSOCIATES, INC., PHILADELPHIA, PENNSYLVANIA

- Rebecca Yamin, Landscape Archeologist

HISTORICAL SUMMARY

In 1791, Pierre L'Enfant proposed that an equestrian monument to George Washington be sited at the western terminus of the National Mall as the central focus of the monumental core of his urban design for the nation's new capital city. The statue was never commissioned. In 1833, the Washington National Monument Society (WNMS) was founded to effect the creation of an appropriate memorial to George Washington. The WNMS elected to hold a design competition for a suitable monument in 1836, which was won by notable architect Robert Mills. Mills' design called for a 600-foot-tall obelisk surrounded by a 250-foot-diameter, 100-foot-tall

pantheon. Although construction began in 1848, it was temporarily halted in 1854 because of deficient funds. By the late 1850s, the impending Civil War further dampened fund-raising efforts to resume construction. The monument thus remained only partially complete until public interest in the monument as a symbol of national reunification increased in the years after the Civil War. As in the antebellum period, however, a lack of funding continued to plague construction attempts. The monument and its environs, significantly altered from Mills' initial design, finally opened to the public in 1889.

The Washington Monument sits atop a grassy knoll, with land gently sloping away on all sides, not far from the banks of the Potomac River. Though it appears natural, this graceful hillock is the result of a large amount of fill brought to the site and engineered to support the foundation of the monument. Since 1889, the monument grounds have played a prominent role in the ceremony, symbolism, and everyday life of the nation's capital. In the decades following the monument's completion, the surrounding grounds evolved slowly into their present form. First, the U.S. Army Corps of Engineers reclaimed from the Potomac River the land south and west of the monument, adding to the extent of public parkland and completing the vision of the McMillan Commission Plan of 1902. By 1943, the Washington Monument had become the centerpiece of an extensive cross-axis formed by the U.S. Capitol to the east; the White House to the north; the Lincoln Memorial to the west; and the Jefferson Memorial to the south.

While the majority of the site has remained open and accessible to the public, other structures have been added to the grounds over the years. The Monument Lodge opened to the public in 1889 and occupies a position east of the monument along 15th Street. Though originally envisioned as a comfort station with a waiting room for monument visitors and "a room for the deposit of the archives" of the Joint Commission for the Completion of the Washington Monument "and the Washington National Monument Society," it presently serves as a food and gift shop.[1] The Survey Lodge, originally completed in June, 1886, is located southwest of the monument.[2] It now serves as a ranger station for the Mall operations of NAMA, though it once housed a boiler and other mechanical equipment for the monument. The Sylvan Theatre is located south-southeast of the Washington Monument. It was opened to the public in 1917 as a natural outdoor theater, but later evolved into a more formalized performance structure. By 1942, the stage resembled its present appearance.

The patterns of circulation and recreation on the grounds have changed dramatically over the years. Vehicular circulation was excluded from the grounds in 1960. Pedestrian paths have come and gone in various configurations over the past century. Site furnishings have also evolved in response to changes in circulation. Recreational features, such as swimming pools, ball fields, and tennis courts, were an important component of the site during the early 20th century, but the majority of these active recreational features have since been removed from the monument grounds. Vegetation has also changed considerably, although street tree patterns and ceremonial groves have always characterized the site. More recent additions to the Washington Monument landscape include road improvements, visitor information features, and the German-American Friendship Garden, dedicated in 1988.[3]

SUMMARY OF FINDINGS

This CLR provides detailed documentation regarding the physical evolution of the monument grounds since the early 19th century. As such, this document supports an understanding of the important historic trends and efforts to commemorate George Washington, the nation's first president, and to provide a suitable public park. As a component of the monumental core of the nation's capital, the monument grounds has played a key role symbolically as well as physically in a range of uses, from day-to-day recreation to special events that attract people from near and far. The CLR also illustrates, through maps, photographs, and narrative description, the monument grounds as they exist in 2003, providing a baseline of information to serve as a resource for future management of the grounds. The CLR's existing conditions documentation supports historic research through investigation of the origins of extant features and the identification of management concerns by raising maintenance and repair issues. It also allows for a comparison of historic and existing conditions to assess integrity. The CLR thus provides information and guidance that may be used to address a range of needs, including park management, research, and maintenance.

The CLR's detailed investigation into the history of the site has provided information that might be utilized to augment the National Register nomination for the Washington Monument Grounds. Detailed documentation of the site's significance can be utilized by the NPS to support treatment and management decisions.

As noted in Chapter Five of the CLR, the monument grounds appear to possess national-level significance as a historic designed landscape under National Register Criteria C within the areas of Architecture, Community Planning and Development, Engineering, and Landscape Architecture, for the period 1791 through 1943. These findings are consistent with the 1980 National Register nomination for the property, which indicates that the Washington Monument derives its primary significance from its role as the nation's foremost memorial to its first president, and from the pivotal and symbolic role the monument and its site play in the urban design of the nation's capital. This significance extends from the initial conception of the National Mall area design by Pierre Charles L'Enfant in 1791, with its centrally placed equestrian statue of George Washington, through the completion of the Jefferson Memorial in 1943.

The Washington Monument structure appears to possess significance as an important example of Egyptian Revival architecture and as a feat of structural engineering that remains one of the tallest freestanding stone masonry structures in the world. The construction period for the Washington Monument extends from 1848 through the initial completion of the knoll in 1889.

The CLR suggests that the monument grounds also appear significant at a local level in the area of Recreation/Entertainment for the role the site has historically played in providing passive and active recreational opportunities for D.C.-area residents and visitors alike. The site has played a significant role in local recreation since ca. 1872, when new gravel roads and avenues were first built to provide access to the grounds; it continues to fulfill this role in to the present. Finally, the

CLR suggests that the site be considered for its significance as a public gathering place, with a potential period of significance that may extend to the present.

The informational potential, and likely archeological significance of the site was also considered as part of this study. Because the monument grounds are in great part covered with fill imported from elsewhere, little potential for historical archeology exists on the monument grounds.[4] Any prehistoric archeological resources will be found below the stratum of fill that sits on top of the ca. 1878 grade. If there was ever prehistoric activity on or near the location where the monument is now located, evidence has surely been severely disturbed. However, the Environmental Assessment for the site (2000) refers to the monument grounds as a prehistoric site from the Late Archaic period (3,500-1,200 B.C.) and there is some potential for prehistoric archeological resources.[5]

The site is otherwise potentially sensitive for historic resources relating to 19th-century landscape design gestures particularly involving former circulation systems. The laying out of pathways and flowerbeds on the grounds during the first half of the 20th century is mentioned in documents, but specific locations are not given for many of those features. If evidence of these features has not been disturbed, archeology could supply a record of changes in site organization and use that is otherwise unavailable. The mound itself has apparently been re-graded many times, but may contain a stratigraphic record of the process involved in creating the mound as it exists today, illustrating how the ground plane has changed over time. Resources that are likely to exist also include the debris from the construction of the monument; rejected or damaged memorial stones discarded and covered with fill; and the remains of the steam tunnel that ran from the Survey Lodge to the monument when it provided steam to power its systems.

Features that exist on the site that are associated with these areas and periods of significance include the monument and plaza ringed by flagpoles; the earthen knoll; the open grassy lawns of the level lands surrounding the knoll; the Constitution Avenue, Independence Avenue, 17th Street, and 14th Street corridors with their associated street tree plantings; the Jefferson Pier, Bulfinch gateposts, Monument and Survey Lodges; long views toward important buildings and monuments; groves of trees in various locations; and commemorative, recreational, and public gathering land uses.

The CLR identifies a series of character areas, which define the types and concentrations of cultural resources that comprise the monument grounds. These character areas are derived from the Washington Monument Development Concept Plan prepared in 2002 for security improvements. They include: 1) sylvan areas; 2) axes; 3) the mound; 4) the plaza; and 5) the flats. These character areas were utilized to develop management zones for the monument grounds project area. Management approaches appropriate to the needs of resources included within each character area and to retaining each area's integrity are documented in Chapter Six.

In summary, the Washington Monument Grounds is a highly significant American landscape that has, over time, taken on a profound symbolic importance in American culture. As such, it is critically important to protect this site from acts of destruction. The information provided in this CLR is intended to provide the basis for evaluating proposed security improvements for the

monument grounds through a synthetic and comprehensive understanding of its historic evolution, existing conditions, National Register-level significance, and current integrity.

RECOMMENDATIONS FOR FURTHER STUDY

Additional research into specific aspects of the site's history remains the primary recommendation for further study. The preponderance of design proposals and concept plans prepared since the L'Enfant Plan was first developed tends to overshadow documents detailing actual conditions. Specifically, the landscape as it appeared when the monument was completed and opened to the public in 1889 is very difficult to determine in detail. Additional documentary and map research may support a more definitive view of that critical time. One avenue for determining the changes in existing site conditions over time, particularly after the second quarter of the 20th century, is historic aerial photographs. Although none have been used in the creation of this CLR, they could play an important role in furthering our understanding of the site's evolution if discovered.

In support of the site physical history section of the CLR, additional avenues of inquiry include:

- Review of the Thomas Lincoln Casey Papers on the Washington Monument housed at the Society for the Preservation of New England Antiquities (Boston) for information on the landscape during construction of the monument and the establishment of the original topography and circulation pattern;

- Record group 42 at the NARA—CP for annual and quarterly reports of the Office of the Public Buildings and Public Parks of the National Capital;

- Information on the use and development of the swimming pools on the monument grounds in the records of the District of Columbia Commissioners (record group 351) at the NARA—DC; and

- The records of the U.S. Fish Commission at the NARA—CP.

ENDNOTES

[1] Details of the existing conditions are developed in greater detail in the Executive Summary of this report. W. W. Corcoran, Chairman of the Joint Commission for Completion of the Washington Monument, to Horatio King, Secretary of the Washington National Monument Society, 7 May 1887; Records Relating to the Design and Construction of the Monument, Monument Grounds, and Offices of the Society, Entry 436; Records of the Secretary, 1833-1951; Records of the Washington National Monument Society, 1833–1951; RG 42; NAB, as quoted in John Milner Associates, Inc., *Historic Structure Report: Washington Monument and Associated Structures. Volume II—Monument Lodge* (Washington: National Park Service, 2004), 2.1.

[2] This is the completion date for the original structure, known as the Boiler House. Renovations to the structure, including an addition of a new power plant within an already existing section, were conceptualized and implemented between 1898 and 1901. See John Milner Associates, Inc., *Historic Structure Report: Washington Monument and Associated Structures. Volume III—Survey Lodge* (Washington: National Park Service, 2004), 2.2-2.5

[3] These details are developed in greater detail in the Executive Summary of this report.
[4] Stephen Potter, Regional Archeologist, National Park Service - National Capital Region, 22 September 2003 review comments pertaining to the August 2003 draft Washington Monument Cultural Landscape Report.
[5] The findings of two archaeological reports conducted since 2003 are developed in greater detail in the Executive Summary.

ADMINISTRATIVE DATA

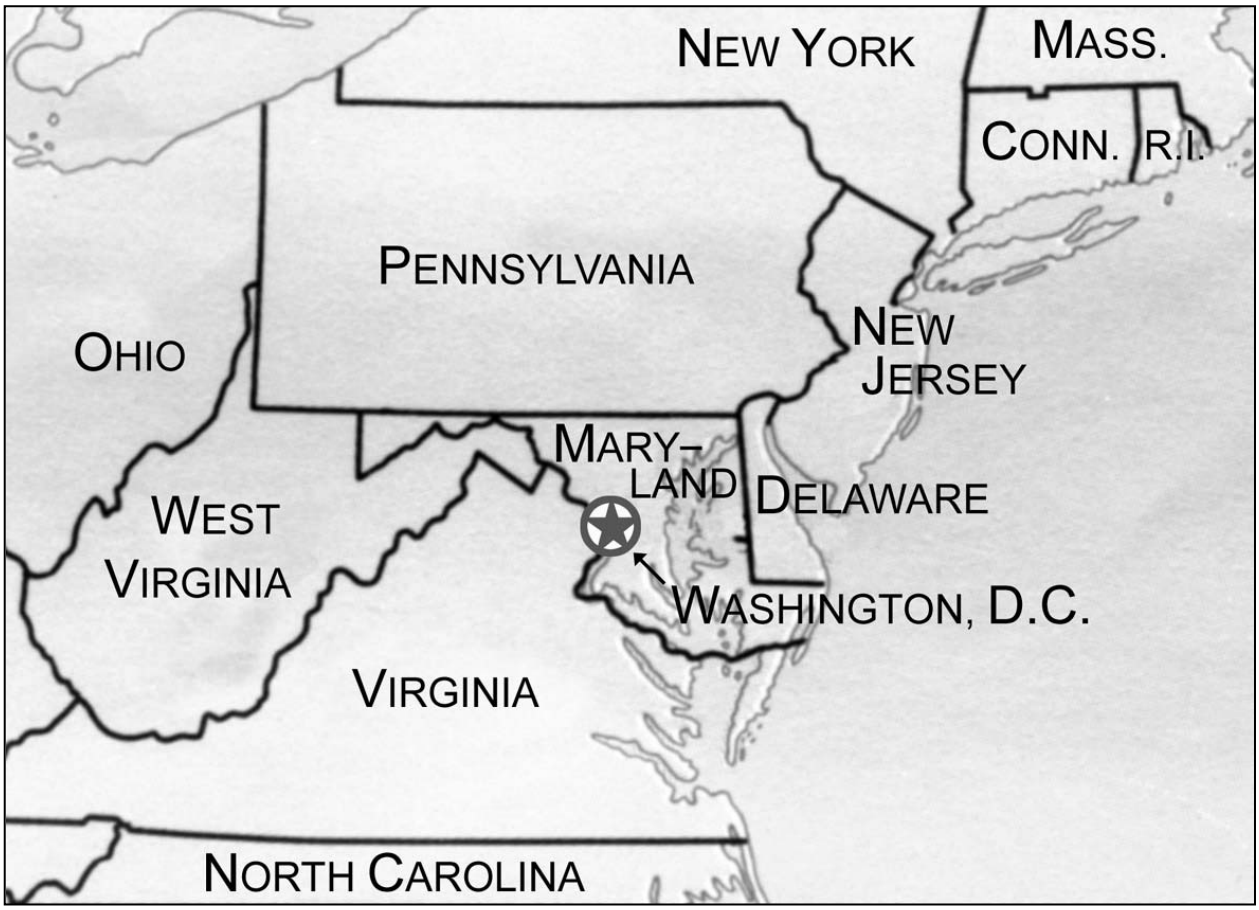


Figure 1-1. Regional vicinity map.

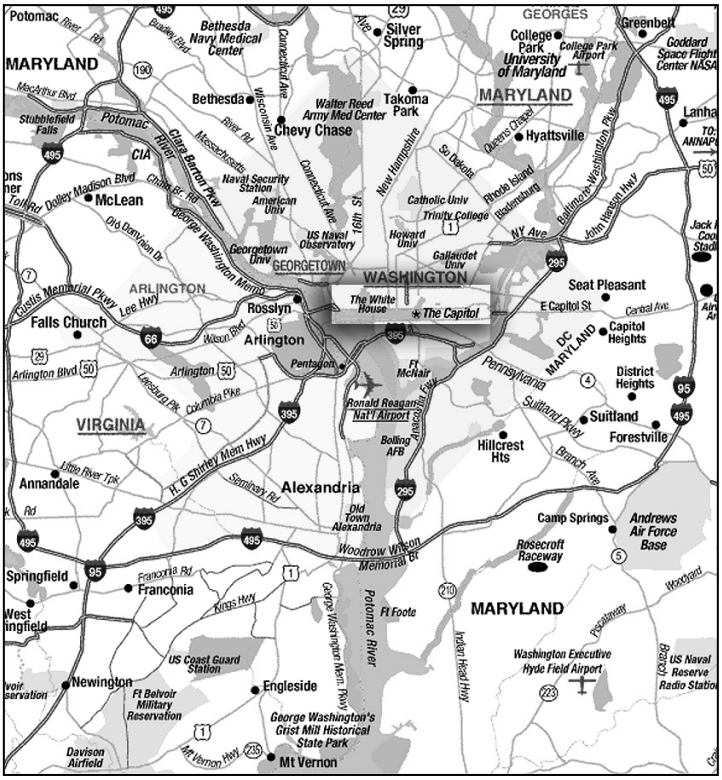


Figure 1-2. Site vicinity map.

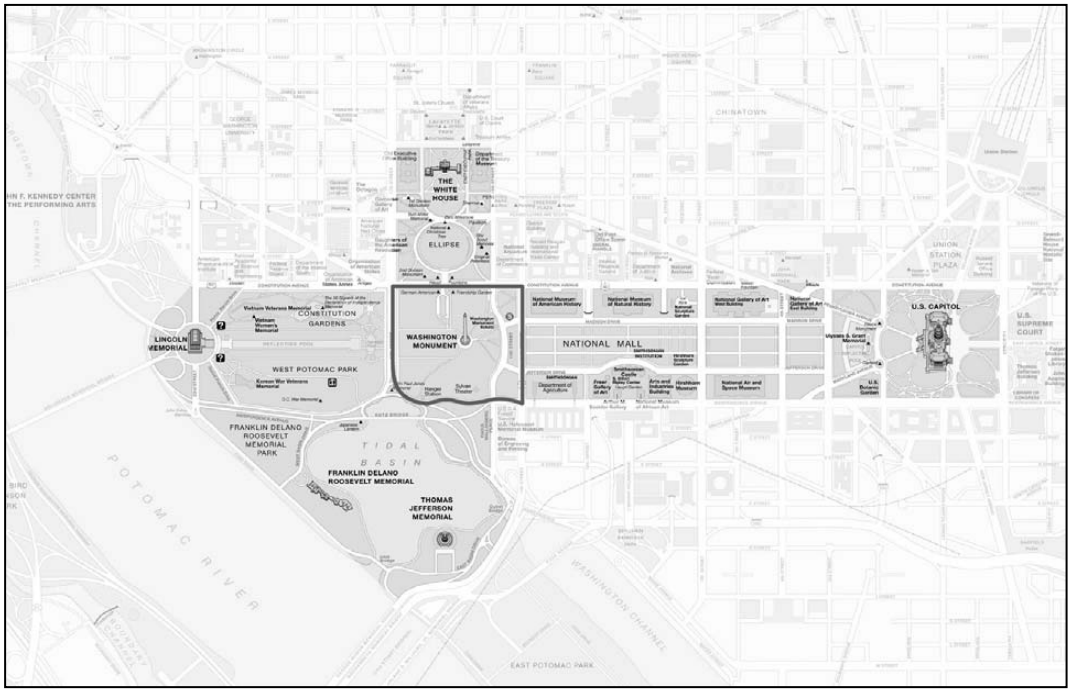


Figure 1-3. Site location map.

Chapter Two

Site History

CHAPTER TWO

SITE HISTORY

INTRODUCTION

This section of the report focuses on the physical history and development of the Washington Monument Grounds. The landscape's rich history is defined by five periods of growth and development:

- Pre-1791: Prehistory to the Founding of the City of Washington;
- 1791-1848: Early Development of Washington City and Initial Efforts to Establish a Monument Honoring George Washington;
- 1848-1889: Construction of the Washington Monument and Development of the Monument Grounds Landscape;
- 1889-1943: Transformation of the Washington Monument Grounds from the Picturesque to the Central Focal Point of a Formal Axis; and
- 1943 to 2003: Planning for the Future and Adapting to Changing Needs.

PRE-1791: PREHISTORY TO THE FOUNDING OF THE CITY OF WASHINGTON

During the Paleo-Indian period (ca. 12,000 to 8,000 B.C.), North America's Mid-Atlantic region was home to hunters and gatherers. The Archaic period people (ca. 8,000 to 1,000 B.C.), seasonally migratory people like their ancestors, increased the scope of their hunting and gathering from the Paleo-Indian period and formed small-scale social systems. A number of Archaic sites have been found on the eastern shore of the Anacostia River and in the Benning and River Terrace areas.[1] The monument grounds contain one Late Archaic site (ca. 3,000 to 1,200 B.C.) Artifacts found on this site by Henry Adams were donated to the Smithsonian by W. Hallett Phillips in 1897.[2] During the Woodland Period (ca. 1,200 B.C. to A.D. 1600), area inhabitants developed ceramic vessels, began agricultural cultivation, and increased the size and complexity of their settlements and social structures. The area now known as the monument grounds was located at the edge of the intersection of the Tiber Creek and the Potomac River, a largely marshy area. At the time of European contact, the Conoy, an Algonquian-speaking chiefdom composed of at least five to seven groups, inhabited the Maryland shore of the Potomac. The Necostin village of Nacochtanke, on the east bank of the Anacostia River in today's Benning neighborhood, and a major trading center for the region, is thought to be affiliated with the Conoy.[3]

The earliest European account of the Potomac region comes from traveler John Smith who sailed up the Potomac River in 1608, and marveled at the plentiful fish in the river. The first land grant on the Maryland shore of the Potomac was received in 1662, although Jesuit missions had been established amidst the Conoy as early as 1639. As Europeans encroached, Native Americans were increasingly—and at times violently—displaced.

By the late 17th century, the land that would become the District of Columbia had been parceled into plantations. Most of these were cultivated, often in tobacco, which left much of the agricultural lands depleted, while others were speculative land ventures. Small port cities, including Georgetown and Alexandria, developed along the Potomac to facilitate the trade of tobacco and later commodities such as wheat and lumber. Other settlements within what would become the District of Columbia, such as Carrollsburg and Hamburgh, remained paper settlements.[4] In 1790, the portion of Prince George's County, Maryland, that became part of the District of Columbia contained twenty households, with a total population of 720.[5] The lands later developed into the National Mall area were part of two large tracts: Beall's Levels, owned by James Williams and Uriah Forrest; and Daniel Carroll's Cerne Abbey Manor.[6]

1791-1848: EARLY DEVELOPMENT OF WASHINGTON CITY AND INITIAL EFFORTS TO ESTABLISH A MONUMENT HONORING GEORGE WASHINGTON

Following ratification of the American Constitution in 1787, the search for a permanent capital began. George Washington oversaw the committee that selected a 100-square-mile diamond at the forks of the Potomac between Georgetown and Alexandria as the location of the new capital city in 1790. Frenchman Maj. Pierre Charles L'Enfant developed a plan for the new capital city of Washington. Influenced by the Baroque style characteristic of European cities, L'Enfant's design included ceremonial spaces linked by grand radial avenues that respected the natural contours of the land in accord with English picturesque landscape ideals. The plan featured a T-shaped ceremonial space, or Mall, that linked the U.S. Capitol with the President's House and was intended to become a center of intellectual and artistic life within the city. Extending west from the Capitol was to be a tree-lined central avenue, which would terminate at an equestrian statue of George Washington located at the crossing of this axis west from the Capitol and the axis south from the President's House *(figure 2-1)*.[7]

L'Enfant's plan contained seventeen reservations, comprising 561 acres, set aside for public and federal building sites.[8] After L'Enfant's initial survey in March 1791 established the location of the city of Washington within the District of Columbia, an arrangement was made between the federal government and the proprietors holding lands within the city. The federal government would pay 25 pounds per acre for those lands designated for use as federal building reservations and public squares, while the proprietors would donate to the federal government the lands platted for streets and alleys.[9]

Washington was planned to be a large city, functioning as a commercial and political center for the nation, and these plans were quickly realized. L'Enfant's plan for the capital included a canal connecting the Potomac and Anacostia Rivers to partly follow the route of Tiber Creek. In the 1790s, the original Commissioners of the District of Columbia began this project but

soon abandoned it, chartering the private Washington Canal Company in 1802 to dig a canal from the Tiber Creek to the Anacostia River below the Navy Yard. Evidently, this corporation did no work on the project, as in 1808, another private company, also called the Washington Canal Company, was chartered to carry out the project. This organization began construction of the canal in the spring of 1810.[10] The canal followed and straightened the path of the Tiber Creek until 6th Street, where it turned south towards the Mall. It then followed 6th Street to the center of the Mall where it turned east towards the Capitol. At the base of Capitol Hill, the canal turned south and then southeast until it joined the James Creek and flowed to the Anacostia River.[11] The canal formally opened for traffic on November 21, 1815. When construction of the Chesapeake and Ohio (C&O) Canal began in 1828, the city of Washington sought to purchase the Washington Canal, improve it and connect it to the C&O Canal. In 1831, the City purchased the canal and began straightening and deepening its channel; this work was completed in 1837. A basin at the mouth of Tiber Creek was created as the connection between the two canals.[12] This work to improve the Washington Canal largely came to naught because it often silted over and rarely saw commercial travel as a result of advancements in transportation technologies during the 1830s and 1840s. Washington failed to develop into a booming trade center, and by the middle of the century the Washington Canal largely functioned as a public sewer.[13]

Like hopes for the canal, the grandiose plans for the Mall remained unrealized throughout the early 19th century. In 1812, there was no unified design for the Mall and Congress began to rent out the land. Congress leased property to public institutions, such as the Columbia Institute for a botanical garden, while other parcels were leased to private individuals for use as storage, gardens, or grazing. Unleased land was often used for grazing livestock or as a site for occasional fairs and circuses.[14]

Thomas Jefferson and the First Meridian

While Thomas Jefferson was president (1801-09), he sought to create a national meridian, or longitudinal line that would serve as a baseline for time keeping and surveying.[15] To establish a First Meridian of the United States, he had three stones erected along a proposed meridian line in Washington: 1) the Meridian Stone on Peter's Hill (currently Meridian Hill); 2) the Jefferson Stone at the intersection of the north-south line through the center of the President's House with the east-west line through the center of the Capitol; and 3) the Capitol Stone, set at the intersection of the north-south line through the President's House and the east-west line from the southern end of the Capitol.[16] The Jefferson Stone was placed on the future Washington Monument Grounds, and would serve as a benchmark for later construction.

The Meridian Stone and the Capitol Stone were single-stone obelisks. However, the Jefferson Stone at the edge of Tiber Creek required more substantial construction to ensure stability in the silty soil. The Jefferson Stone was built on 6-1/2-foot-deep foundation with a structure of four large freestone slabs as the walls. The center was filled with broken stone and cement. This pier was capped with a slab of brownish sandstone about 10-inches square, with the lines of the two axes carved into the top.[17] This monument stood approximately 3 to 4 feet above grade on the land side and six feet from the banks of Tiber Creek. After the erection of the three meridian stones, it appears that Jefferson did little to promote the use of the national meridian. Although, through the mid-19th century the Jefferson Stone served as a benchmark

for surveyors, it also served as a guidepost for boats using the Washington Canal, and has often been referred to as the Jefferson Pier.[18]

Founding of the Washington National Monument Society

During the early years of Washington City's development, many proposals for national institutions and monuments to be sited in key locations around the city emerged. These included Benjamin Latrobe's plan for a national university on the Mall, his pyramidal design for a tomb for Washington, and the equestrian statue of Washington approved by Congress in 1783. Many of these proposals remained unbuilt due to funding issues and political challenges.

The 1832 centennial of Washington's birth focused public attention on the lack of a monument honoring George Washington in the nation's capital. Congress had yet to make provisions for a suitable monument, and so on September 26, 1833, prominent Washington citizens, including Chief Justice John Marshall and George Watterston of the Library of Congress, founded the Washington National Monument Society (WNMS). Marshall served as the organization's first president, with James Madison assuming this role after Marshall's death.[19] The WNMS immediately began raising funds from the general public to build a suitable monument to Washington in the city that bore his name. To promote the monument as a national effort, members of the WNMS invited all citizens to contribute and limited donation amounts to one dollar per person, per year.[20]

By 1836, the WNMS had raised over $28,000. In August of that year, they began soliciting designs for a monument to Washington that was to cost no less than $1,000,000. Several designs were submitted, including one by Robert Mills. The WNMS felt that none of the designs were "coextensive with the Nation" and did not select a design at the time.[21]

The economic turbulence of the Panic of 1837, along with the limit on individual donation amounts, slowed the flow of contributions. The WNMS rescinded contribution limits in 1845.[22]

Designs for a New Monument Honoring George Washington

In 1841, Robert Mills was commissioned to design a building for the National Institution, founded to oversee the bequest of James Smithson's collection to the United States. Mills designed not only a building in the ancient English and Norman style of architecture, but a plan for the entire Mall. The grounds of the National Institution were to be filled with gardens based on the medieval medicinal gardens, while the eastern and western portions of the Mall were to be picturesque with curving walks, groves of trees, and long vistas.[23] No portion of Mills' design for the National Institution or its grounds was implemented. Instead, when construction began in 1848, the Smithsonian was built according to James Renwick's Romanesque design.[24]

Still without a design and facing criticism from Congress on the slow pace of fund raising, the WNMS formed a committee in November 1844 "to procure a suitable design" for the monument.[25] In April 1845, this committee selected a design by Robert Mills, estimated to cost $200,000 to complete, with the shaft alone estimated at $50,000.[26] This design was formally adopted by the Society on November 18, 1845.[27] This design featured a 600-foot-tall obelisk with a nearly level top surrounded by a colonnaded rotunda 200 feet in diameter and 100 feet

tall. The rotunda was to be edged by thirty 12-foot diameter columns forming a gallery or 'National Pantheon' with statues of thirty prominent Revolutionary War heroes and signers of the Declaration of Independence. The rotunda was to be crowned with a statue of Washington in a chariot. Visitors would enter the obelisk through two 15-foot-tall, 6-foot-wide portals on the east and west elevations. Each entrance included a heavy pediment and entablature with a winged ball and asp over the door. The size and scale of these entrances was in keeping with the massive pantheon planned by Mills. Visitors would travel to the observatory at the top of the obelisk by a 'railway' *(figure 2-4).*[28]

By 1847 the WNMS had $87,000 on hand for construction and began petitioning Congress for a suitable site for their monument, preferably on the Mall. Due to earlier Congressional criticism of the Society, they also appointed a committee to investigate potential privately held sites for the monument.[29] Ultimately they would select the site identified on L'Enfant's plan for an equestrian statue to Washington as the most suitable for their testimonial.

1848–1889: CONSTRUCTION OF THE WASHINGTON MONUMENT AND DEVELOPMENT OF THE MONUMENT GROUNDS LANDSCAPE

The WNMS's petitioning of Congress for a public site upon which to build a monument to Washington finally succeeded in 1848. On January 31, Congress passed a resolution authorizing the President of the United States and the board of managers of the Society to select a site within the city's public grounds and reservations. On April 12, President James Polk (1845-49) executed a deed granting the WNMS Reservation No. 3, which consisted of approximately thirty-seven acres on the Potomac River.[30] This site included the area selected by L'Enfant for an equestrian statue of Washington as well as the Jefferson Stone.

While L'Enfant's plan *(figure 2-1)* shows an equestrian statue of George Washington at the intersection of the cross-axes from the President's House and the Capitol, the foundations for the Washington Monument were actually laid 371 feet east and 123 feet south of this intersection.[31] The selection of the specific site for the monument within this reservation has been the subject of much speculation by historians as the process is not well documented in the records of the WNMS. As the actual intersection of the key axes occurred along the banks of Tiber Creek near its confluence with the Potomac River, it is likely that the land was too swampy to support the weight of the monument, leading to construction on firmer land south and east of the intersection.[32] The cross-axis site may have also required expensive filling operations to support the monument with its large pantheon.[33] Another likely factor was the Mall's lack of symmetry about the Capitol axis at this time due to the presence of the Washington Canal, which shifted the east-west center line of the Mall to the south of the Capitol axis. The present monument site falls along the approximate north-south center of the mall as it existed in 1848.[34]

Even though Reservation No. 3 was public property, there appear to have been private uses associated with the land during the 19th century. In August 1848, the Board of Managers of the Society resolved to notify "the persons now occupying a portion of the ground assigned to the Society as a site for the monument to remove their houses and fences thereupon within three months."[35] The Board of Managers also voted to allow limited private use of the grounds in

October 1848 by leasing to J. Pettibone "a portion of the southern part of the monument place, near the river, for forming a pond in such shape as [the Building Committee of WNMS] shall designate, to obtain Ice at the annual rent of fifty dollars."[36]

Because the society was unable to raise enough money to complete the monument and pantheon according to Mills' original plan, the architect was commissioned to prepare an intermediate plan that would allow construction to begin. This intermediate design reduced the height of the obelisk by 100 feet to 500 feet and included a base featuring a series of massive steps rather than the pantheon of his earlier design. The design allowed for the addition of the pantheon at a later date as additional funds became available.[37]

Initial Construction Efforts

In June 1848, work began on the monument's foundations. These were built of rough, untooled blue gneiss in large blocks no less than 16 feet long and 7 feet thick. The walls of the monument were built of white marble ashlar blocks backed by blue gneiss. Stone arrived at the site via the Potomac River. A wharf with lifting rigs was constructed along the river and a railway was built to transport stone to the monument.[38] Mills used the Jefferson Stone as a benchmark to measure any settlement of the monument.[39]

With great pomp and ceremony, the cornerstone of the Washington Monument was laid on July 4, 1848. President James K. Polk led a parade from the Capitol to the site that included members of the Cabinet and Congress, military units, fire companies, and bands. The 24,500-pound white marble cornerstone, complete with a memento-filled zinc case, was formally laid by Grandmaster Benjamin B. French of the Grand Lodge of Free and Accepted Masons of the District of Columbia. Grandmaster French wore the same Masonic apron and sash that Washington had worn when he laid the cornerstone of the Capitol in 1793.[40] A two-hour oration was given by Speaker of the House Robert C. Winthrop in which he stated "Let the column which we are about to construct be at once a pledge and an emblem of perpetual union! Let the foundations be laid, let the superstructure be built up on and cemented, let each stone be raised and riveted in a spirit of national brotherhood!" That evening, a grand fireworks display completed the festivities.[41] This celebration was the precursor to the annual 4th of July celebrations held on the monument grounds through the 1850s.[42]

Work to improve the Smithsonian grounds and the remainder of the Mall began in 1849, when the newly created Department of Interior received control of the Mall, and its commissioner—Ignatius Mudd—recommended to President Millard Fillmore that Andrew Jackson be retained to "prepare a plan for converting the whole Mall, including the Smithsonian grounds, into an extended landscape garden."[43] Downing created a plan for the White House, Capitol, Smithsonian, and monument grounds that encompassed six different, but compatible garden designs *(figure 2-5).* Downing's plan included curvilinear paths and roads with clusters of trees, a fountain garden between 7th and 3rd Streets, and an evergreen garden between 12th and 14th Streets.[44] By the time of Downing's untimely death in 1852, only enough funds had been allocated to landscape the grounds adjacent to the Smithsonian. Downing's plan, however, guided the development of the Mall throughout the remainder of the 19th century.[45]

Work on the Washington Monument progressed rapidly, considering that the marble was dressed and polished by hand, rather than by machine as was being done in other cities.[46] The monument grounds soon took on the appearance of a busy construction site, and included various outbuildings, such as a dwelling for the day watchman, an office and reception room for visitors, an engine house, a saw shed, a stone cutters shop and shed, two stone block sheds, a carpenters shop, a smith's shop, a cement house, a feed house, and a stable.[47] By the end of the 1848 work season, the foundations were complete. By 1852, the walls had reached a height of 126 feet *(figure 2-6)*.[48]

As construction progressed, the WNMS continued to seek additional contributions. Immediately after the cornerstone was laid, the Society took advantage of public interest in the project to make a special appeal for funds to the general public, as well as an appeal for all public and private students to contribute a penny a month. In 1850, an appeal was made to all banks in the United States. This was followed by an appeal made in conjunction with the census. The census officers would be given a 15-percent commission on contributions they collected. None of these appeals met expectations.[49]

Monument Stones

In 1849, as a measure of support for the project, some citizens of Alabama proposed donating a block of marble from their state for insertion into the interior of the monument. This gesture was accepted. Other states and territories were subsequently permitted to donate stones for use in the monument. Many of these early stones extolled the virtues of George Washington and the country that he helped found. Later, Indian tribes, social societies, professional organizations, labor unions, businesses, individuals, and foreign countries were permitted to donate stones for the monument. Some of these stones made no mention of Washington or the country. These stones were stored and displayed in a lapidarium built on the monument grounds until they were inserted into the monument. By 1854, ninety-two of these presented stones, including one from each state and two of the territories, had been inserted into the interior of the monument.[50]

Controversy and Funding Problems Lead to a Suspension of Work on the Monument

On March 6, 1854, members of the Know-Nothing Political Party who held anti-immigrant and anti-Catholic beliefs, raided the monument grounds and stole a stone presented by the Pope from the Temple of Concord in Rome. Donations to the WNMS dwindled amidst public furor over the act of vandalism. The Society advertised a $100 reward for information on the theft, but no one ever came forward with information leading to its recovery. Today, the location and fate of the Pope Stone remains unknown. [51]

Work on the monument continued through the 1854 building season, ending at a height of 152 feet above the foundation. At this point, the funds of the Society had been exhausted, and the organization appealed to Congress for additional monies to continue construction. On February 22, 1855, the House considered a donation of $200,000 to the Society to enable it to continue construction. This resolution was rescinded when it became known that members of the Know-Nothing Party had held illegal elections for officers of the WNMS on February 21, 1855, and then forcibly taken over the monument grounds. This created two rival boards governing the

WNMS and Congress refused to consider financial aid to the monument until the situation was resolved.[52] The Know-Nothing-controlled Society took possession of the monument, continuing construction and adding a few courses of masonry to the monument shaft.[53] Much of the stone used was taken from refuse found on the grounds, however, and was later removed due to poor workmanship. The Know-Nothings returned control of the monument grounds and the organization's records to the original WNMS in 1858.

Due to the decline in public trust of the WNMS after the theft of the Pope Stone and the illegal take-over, additional fund raising efforts did not solicit sufficient response to move forward with construction. Rising political and social tensions on the eve of the Civil War contributed to a hiatus in the Society's work. Realizing their situation, both financially and politically, the WNMS determined to maintain the monument and grounds as best they could while awaiting a more favorable climate in which to complete their project. The Washington Monument would thereafter stand unfinished for nearly two decades.[54]

> That truncated shaft, with its untidy surroundings, looked only like an insult to the memory of Washington. It symbolized nothing but an ungrateful country, not destined—as, God be thanked, it still was—to growth and grandeur and imperishable glory, but doomed to premature decay, to discord, strife, and ultimate disunion.[55]

The Affects of the Civil War

Beginning in 1861, the mobilization needs of the U.S. Army led to the conversion of the monument grounds to accommodate various housing, storage, and training endeavors. In May 1861, President Lincoln (1861-1865) ordered Lieutenant Bickworth of the U.S. Army "to use the monument grounds for cattle belonging to the Government" as part of the supply effort for Union troops.[56] The grounds were soon enclosed with a fence, the first forty-five head of cattle were moved to the site, and one of the outbuildings was converted for hay storage. Over the course of the war, the number of cattle kept on the grounds increased and extensive horse stables, an officers quarters and mess, a civilian bunkhouse, and a slaughterhouse were built to accommodate various military needs *(figure 2-7)*.[57]

In the midst of the war, the WNMS received a 45-foot-by-30-foot Union flag in honor of Washington's birthday. On February 22, 1862, a Navy rigger scaled the monument and installed the flag on a pole at the top, where it remained for the duration of the war.[58]

By 1861, the landscape of the monument grounds had changed little from the city's early days. The 45 acres of the grounds were still bounded on the north and west by the Washington Canal and Potomac River, and remained disconnected from the larger Mall and its pleasure grounds *(figure 2-8).*

After the war, with the evacuation of the Army's cattle yard and a lack of additional construction activity on the monument, the monument grounds became home to prison escapees and army deserters, among others, and came to be known as "Murderer's Row."[59] This use of the grounds continued until 1870 when Congress established a territorial government for the District of Columbia. This government came under the direction of

Alexander "Boss" Shepherd, Vice President of the Board of Public Works, and Orville E. Babcock, superintendent of the U.S. Army Corps of Engineers' Office of Public Building and Grounds (OPB&G), conducted many improvements within the city, including grading and paving streets, installing street lights, planting thousands of trees, and enclosing open sewers.[60] It was during this period that the Washington Canal was directed into a culvert and B Street North (now Constitution Avenue) constructed over it.[61]

The Office of Public Buildings and Grounds Improve the Washington Monument Grounds

In 1872, the OPB&G began work to improve the area around the monument, then "in very bad condition, a portion overflowed at high tide, the rest ungraded, without drains, roads, walks, trees or shrubbery."[62] To improve the grounds and make them publicly accessible and attractive to the public, the OPB&G built tree-lined, curving gravel roads through the grounds: sixty-nine-foot wide Meridian Avenue (16th Street) and a thirty-five-foot wide, curving road connecting B Street at the canal to 14th Street at the Agricultural Department grounds. The newly graded grounds were sown with grass seed.[63]

Outbuildings used in the first phase of construction remained on the grounds, though they detracted from the public garden image the OPB&G was trying to create. The WNMS offered Orville Babcock the use of several buildings on the grounds, one of which he used for tool and property storage.[64] After this, the Society auctioned some items used in construction of the monument, including old stones, tools, the engine boiler, and old houses.[65]

As part of a seawall construction project intended for flood control under the direction of Babcock, the monument grounds were expanded by draining approximately twenty acres northwest of the monument formerly covered by Tiber Creek. This reclaimed land was a part of Tiber Creek and became the site for Babcock Lake to the north of the monument and another unnamed lake to the west of the monument *(figure 2-9).* The western lake was partially formed from the prism of the former Washington Canal. The U.S. Commission of Fish and Fisheries used these lakes to raise carp. An island in the western lake and the land between the two lakes were fitted with hatching ponds.[66]

As part of the filling efforts to create these two lakes and roads around the monument grounds, the Jefferson Stone or Pier was broken up and removed from the grounds in August 1872. The importance of the marker was not realized until work resumed on the Washington Monument and attempts made to determine if the monument had settled were thwarted by the loss of Mills' benchmark. Its disappearance also caused problems for property owners, as it had also served as a surveyor's benchmark in the metes and bounds for many nearby properties. After much debate as to the original stone's location and function, the Jefferson Stone Marker was rebuilt on the foundations of the original Jefferson Pier in December 1889.[67]

During Frederick Law Olmsted', Sr.'s redesign of the Capitol Grounds, the stone gatehouses and gateposts were removed and placed along B Street North, which was being widened at this time due to the removal of the Washington Canal. A pair of gatehouses was placed at the intersection of B Street North and 15th Street on the southwest and southeast corners.[68] The gatehouses and gateposts are attributed to Charles Bulfinch's redesign of the Capitol Grounds between 1818 and 1829.

In spring 1881, a catastrophic flood almost reached the White House. In 1882, the U.S. Army Corps of Engineers began dredging the Potomac Channel and filling the Potomac flats west and southwest of the monument grounds to prevent a repeat occurrence.[69] These lands were designated as space public parks in 1897 and are today known as East and West Potomac Parks.

Continuation of Work to Complete the Washington Monument

In the aftermath of the Civil War, the WNMS sought to resume construction on the obelisk as a symbol of national reunification. At the 1866 meeting of the WNMS, held on February 22 to mark Washington's birthday, President Andrew Johnson (1865-69), said to the Society, "Let us restore the Union, and let us proceed with the monument as its symbol until it shall contain the pledge of all the States of the Union."[70] Despite this presidential endorsement, fundraising appeals to the general public and Congress remained unsuccessful.

The nation's centennial celebration of 1876 helped to heighten awareness of the embarrassment of an incomplete Washington Monument:

> At present the Monument is a reflection upon the whole country. It seems as if the admiration and respect felt by our people for the founder of our Republic had met with a great check, and that the gratitude for his eminent services had completely died out. The appearance of this half-finished pile of marble seems to mark us as a fickle people, anxious one day to do honor to the greatest character in our history, the next quite indifferent whether his memory is honored or not.[71]

Finally on July 5, 1876, after much lobbying by the WNMS, Senator John Sherman introduced legislation authorizing the federal government to assume responsibility for completion of the monument. On August 2, 1876, this resolution passed unanimously.[72] It provided $200,000 for completion of the monument, to be divided into four equal annual installments. One condition of this funding was that the WNMS return ownership of the Washington Monument and Grounds to the federal government. The Society could continue to raise funds for the monument as well as act as an advisor in the completion and maintenance of the monument, but a Joint Commission for the Completion of the Washington Monument, established by Senator Sherman's resolution, would oversee completion of the monument.[73] The actual construction work was to be carried out by the U.S. Army Corps of Engineers with Lt. Col. Thomas Lincoln Casey as Engineer in Charge.

Once appointed, the Joint Commission spent two years deciding how best to complete the monument. The three alternatives considered included: completion of the monument as originally designed by Robert Mills, with the national pantheon; completion of the obelisk as designed by Mills; and using the incomplete monument as a base for a new design.[74] The ability of the foundations to support the completed monument became the subject of much study and debate. Engineers gave conflicting reports.[75] In June 1878, Congress approved $36,000 to be spent strengthening the foundations.[76]

Before Casey began construction of the reinforced foundations, he prepared the grounds for a large influx of workers and equipment. During this second phase of construction, the grounds immediately around the monument were given over completely to construction activities, while the outer regions of the site continued to be maintained as a public park.[77] The area at the base of the monument soon housed a variety of outbuildings, including a carpenters' and rigging shop, a cement store house, a three-forge blacksmith shop, three stone cutting sheds, five boom derricks at the base and apex of the monument, and two steam engines. Once again a railroad was built on the grounds to facilitate handling of the stone. During this second phase of construction, all materials were transported directly to the building site by railroad, and subsequently carried on a trestle to the east entry of the monument.[78]

Casey proposed a remarkable plan for reinforcing the existing foundations that involved removing portions of the original foundations to tie in massive concrete buttresses to the sides of the foundations as well as installing massive concrete footings below the original foundations. This digging into and under the foundations was skillfully planned so as not to endanger the stability of the monument. When completed it had not caused any cracks or damage of any kind to the monument, a testament to Casey's skill as an engineer and construction manager *(figure 2-10).*[79]

In preparing his plan for strengthening the foundations, Casey also developed a design for the completed monument. Casey's design was for a plain obelisk, without Mills' pantheon or applied Victorian embellishment. In the process of developing this design, Casey received advice from George Perkins Marsh, the American ambassador to Italy, on the proper form of obelisks. Marsh had studied Egyptian obelisks in Rome and provided Casey with information about their proportions. Casey's redesign reflected this information and called for a 555-foot-tall unadorned obelisk with a marble exterior and granite interior. The 500-foot shaft would be capped with a 55-foot steeply-pitched pyramidion of iron and glass. The outer masonry structure would be fitted with an interior skeleton of iron that would support the platform elevator for building materials and the later passenger elevator and stairs. This obelisk was 45 feet shorter than Mills' design but had a much steeper pyramidion.[80]

Although this design had its detractors, the WNMS supported it in a presentation to Congress:

> It has been objected in some quarters that the ancient obelisks were all monolithic—massive single stones, cut whole from the quarry; but our country has been proud to give examples of both political and material structures which owe their strength to union; and this monument to Washington will not be the less significant or stately from embodying the idea of our national motto, '*E pluribus unum.*'[81]

Congress approved Casey's preliminary design in the spring of 1880. A series of maps of the city of Washington illustrate the configuration of the monument's urban context at the time (*figures 2-11 through 2-14*).

Once the new foundations were complete, a steep earthen embankment was built over them. This mound was later expanded to a size of 175 feet by 220 feet at the top. The fill used in the expansion of this mound included pieces of bluestone gneiss removed from the original

foundations as part of the new construction. Casey assumed that the weight of this stone would provide greater support for the foundation.[82] As work on the monument progressed, the sides of the embankment were graded and sown with rye grass seed to prevent the terrace slopes from washing out and to control the dust that could damage machinery on site.[83]

Improved technology in materials, such as the Phoenix Iron Columns that Casey used as the interior structure, and equipment, such as the machine-dressed and quarried stone and Otis Brothers steam hoist for carrying stones to the top of the obelisk, allowed work during this second phase of construction to progress faster and more regularly than the initial phase. The regularity of Congressional appropriations, rather than sporadic donations that funded the first phase, also improved the pace of construction.[84]

Once the foundations were strengthened, Casey turned his attention to construction of the shaft. In order to gain a stronger bed for the new work, the inferior stonework installed during the Know-Nothing tenure was removed, bringing the height of the monument to 150 feet. The line currently visible around the monument at 150 feet is due to differences in weathering between the old stone and the new stone, even though the marble in both phases was largely from the same quarry.[85] Before any new stone could be laid on the shaft, the interior structure needed to be installed. The interior structure was to be composed of eight Phoenix columns supporting the elevator and stair. These columns were built in 20-foot segments. The interior structure was first built 20 feet higher than the top of the shaft and then walls were built up to that level, and the process was then repeated.[86]

On August 7, 1880, construction of the shaft walls resumed with the laying of a second 'cornerstone' at the 150-foot level. Work on the shaft progressed smoothly through the next four building seasons, despite problems with maintaining a steady supply of stone and other materials, including the iron columns. The top of the shaft, at the 500-foot level, was completed on August 9, 1884.[87]

In 1884, the final design of the pyramidion was altered from Casey's first design. In consultation with Bernard Richardson Green, one of his assistant engineers, Casey designed an unusual cap for the Washington Monument. The new pyramidion design met difficult criteria: the pyramidion needed to be as light as possible so as not to further burden the structure, yet it needed to be strong enough to resist the wind at a height of 555 feet. It also needed to be of a material that would not discolor the marble shaft. The completed pyramidion was built solely of marble. The weight of its stones was carried by twelve marble ribs, integral to the marble facing stones, rather than the stones below. These ribs begin at the 470-foot level. The corner ribs joined halfway up the pyramidion and the center ribs met at the apex to form a keystone. These marble blocks were joined by precisely cut joints, most of which were originally intended to be open and were detailed to shed as much water as possible.[88]

On December 6, 1884, the capstone for the Washington Monument was set in place and a small cast-aluminum pyramidal cap placed at the very apex of the monument. William Frishmuth of Philadelphia cast the 100-ounce, 5.6-inch-wide and 8.9-inch-tall cap. At the time, aluminum was a precious metal, as modern methods for refining the ore had yet to be perfected. The monument's aluminum cap was one of the largest pieces of aluminum ever cast at that time and, because of this novelty, was displayed in the windows at Tiffany's of New

York before being installed.[89] Aluminum was chosen for several reasons: it would not tarnish and discolor the marble below, and as a good conductor of electricity, it would serve as the connector for a series of small lightning rods on the pyramidion.[90]

Dedication of the Washington Monument

The formal dedication of the Washington Monument was held on February 21, 1885. Representatives of all branches of government, the armed forces, many social organizations, including several Masonic lodges, and others braved the snow and cold weather to witness the dedication *(figure 2-17).*[91] In a speech to the crowd, Casey said "the resources of modern engineering science have supplied means for the completion of the grandest monumental column ever erected in any age of the world."[92] The Hon. Robert C. Winthrop, who had delivered an oration at the 1848 cornerstone-laying ceremony also spoke:

> America is certainly at liberty to present new models in art as well as in government, or to improve upon old ones; and, as I ventured to suggest some years ago, our monument to Washington will be all the more significant and symbolic in embodying, as it does, the idea of our cherished national motto, *E pluribus unum*. That compact, consolidated structure, with its countless blocks, inside and outside, held firmly in position by their own weight and pressure, will ever be an instructive type of the national strength and grandeur which can only be secured by the union of 'many in one.'[93]

The ceremony ended with President Chester Arthur's (1881-85) formal dedication of the Washington Monument "to the immortal name and memory of George Washington." The day was capped with a stunning fireworks display that included displays of national emblem rockets in red, white, and blue; depictions of Niagara Falls, agricultural implements, mechanical tools, and Washington resigning his commission to Congress; and a finale of Washington flanked by Liberty and Columbus.[94]

Even though the exterior of the monument was complete, much work remained to be done before the monument could be opened to the public. Eight 'presentation blocks' needed to be inserted into the interior walls, the steam stone and equipment hoist needed to be converted for passenger use, and the interior wooden stair components required replacement with ironwork.[95]

Lt. Col. Casey also planned to fill in both of the large entrances to the monument. He felt that their design to complement Mills' large national pantheon conflicted with the simplicity of the obelisk's current form. In place of the pantheon, Casey proposed an enlarged terrace surrounding the base of the monument and supported with a balustrade-topped masonry wall ornamented with bas reliefs. Four double stairs would lead to the top of the terrace while tunnels under the terrace would provide access to the interior of the monument. The plan's high cost—estimated at $612,300—received negative feedback from members of Congress. Casey then proposed a simpler plan that called for expanding the existing terrace so that it gradually sloped to meet the surrounding grade and planting trees and shrubs around the mound. At an estimated cost of $166,800, the plan's implementation occurred as the construction buildings and machinery were removed from the site.[96]

As part of this process, the boilers that powered the elevator's steam engine needed to be removed from their location at the base of the monument and relocated elsewhere on site. The relocation site stood approximately 750 feet southwest of the monument, where the boilers' chimney could be concealed within a grove of trees. The new boiler house, now the Survey Lodge, contained two coal-fired boilers, a ninety-ton capacity coal vault, an ash vault, and a work room. Brick tunnels connected the boiler house to the underground engine room, now the below-grade mechanical room, at the base of the monument. The boiler house was built "of white marble and granite, to be obtained from the waste of the stock used in building the monument and now lying on the ground near the base" *(figure 2-23)*.[97] William Bradley, a Washington contractor, began work on the Boiler House in October 1885 and completed it in June 1886.[98]

The Washington Monument was formally opened to the public on October 9, 1888. Once the monument was complete, the Joint Commission was disbanded and control of the monument and grounds was transferred to the OPB&G, administered by the U.S. Army Corps of Engineers.[99]

The Monument Lodge

In June 1887, Casey asked William Poindexter and Co., architects in Washington, D.C., to prepare a design for a "building for public comfort and for the WNMS."[100] The resulting structure—the current day Monument Lodge, or Marble Lodge—is a one-story, flat-roofed Greek temple-style building with a marble exterior with brick backing.[101] It initially housed a public room archives for the WNMS's records, keeper's room for the custodian for the Washington Monument, restrooms, and a boiler room with coal bin *(figure 2-24)*.

The Monument Lodge would serve as a waiting area for visitors planning to take a guided tour of the monument. It therefore needed a location convenient to the monument, but also one that did not intrude on views of the monument. The first design for the Monument Lodge in 1887 recommended that it be sited in the natural approach by visitors, and opposite the main entrance near the foot of the emerging mound. The building was to be placed 325 feet east of the monument and face north. This location was selected because "it [would] not prevent an unbroken view of the entire shaft of the monument from any point."[102] The WNMS, which funded construction of the Monument Lodge, and the Joint Commission, objected to this location as too far from the monument. In April 1888, a second proposal was made for siting the building. This proposal recommended that the building be placed just south of the monument and face east with the long axis of the building sited on axis with the monument. The north end of the building was to be located 35 to 40 feet from the monument.[103] Lane and Malnati of Washington, D.C., received the contract for building the Monument Lodge and work began later that month. On May 8, with the foundations partially constructed, the Building Committee of the Joint Commission, decided to shift the location of the lodge so that the south wall became the north wall.[104] By May 15, an entirely new location for the lodge had been chosen about 480 feet east of the monument, its final location. Contractors Lane and Malnati were paid an additional sum for the change, and work progressed on the structure.[105] The lodge opened to the public in January 1889.[106]

Additional Improvements to the Monument Grounds

As the Washington Monument was being readied to receive the public, so were the monument grounds. The OPB&G had improved portions of the grounds with roads and trees in the 1870s, but on-going construction, establishment of various outbuildings on the site, and associated traffic restricted public use of the park.[107] Work on the grounds also incorporated improvements to the new land area being established through the filling of the Potomac flats as well. It was during this filling that the modern Tidal Basin and Washington Channel were created *(figure 2-21)*. Throughout the construction of the monument, those portions of the grounds unaffected by the work were maintained by regraveling roads, reseeding bare spots, and mowing grass for hay.[108] Otherwise new improvement projects were postponed on the grounds until the Washington Monument neared completion.[109]

Once the superstructure of the monument was complete, work began to improve the grounds immediately around the monument. In 1888, "the grounds around the monument [were] being raised and will eventually be well improved. A portion of the main road system with the park has been laid out for public travel, the lawn surfaces graded and planted in part with evergreen and deciduous trees."[110] The plan adopted for the grounds was the more naturalistic and less expensive plan proposed by Casey in 1884, which included a gradually-sloping hill that was an extension of the earthen terrace surrounding the foundations during construction. Additional roads and paths were also planned for the grounds.

At the very base of the Washington Monument, a paved granolithic plaza with a seventy-foot radius, granolithic curb, and outside gutter was installed to prevent the earthen terrace from washing out. A fifty-foot wide gravel roadway encircled this paved area. A series of thirty-foot-wide gravel roads and nine-foot-wide paths connected this plaza to the other portions of the grounds.[111] From the maintenance records, it appears that the paths and roads on the monument grounds were surfaced in a variety of materials such as plank walks and gravel carriageways. A plank walk extended between 14th Street and the Lodge House in 1889, and gravel carriageways led from 14th Street to the monument. [112]

Even in their unfinished state, the monument grounds began to be used as a public gathering space. In May and June 1887, the National Drill used the monument grounds as a camp site and held infantry drills on the Ellipse *(figure 2-25)*.[113]

In March 1887, Thomas Lyons of Baltimore was contracted to deposit approximately 250,000 cubic yards of fill around the base of the monument to create the surrounding mound and to fill Babcock Lake north of the monument *(figure 2-28)*.[114] This work was completed by December 1888.[115] By 1889, the monument grounds were treated similarly to the A.J. Downing-designed Mall (1854), with curvilinear paths, gardens, and small groves of trees. As early as December 1889, "the drive about the monument is . . . becoming quite a popular one," fulfilling the intentions of the designers of the grounds.[116]

A third pond, referred to as the south pond, was added to the grounds by 1877 by enclosing the former mouth of Tiber Creek/Washington Canal.[117] This pond was located to the west of the monument, and south of the other constructed water bodies.

1889-1943: TRANSFORMATION OF THE WASHINGTON MONUMENT GROUNDS FROM THE PICTURESQUE TO THE CENTRAL FOCAL POINT OF A FORMAL AXIS

Once completed, the Washington Monument Grounds continued to be maintained and improved to meet the changing needs of Washington, D.C.'s, residents and visitors. The Washington Monument became a highly popular tourist attraction, particularly its open spaces that were used as a place of public assembly and for recreation, entertainment, and celebration.

However, as the surrounding area changed, so did the Washington Monument Grounds. The McMillan Plan and its implementation changed the monument's surroundings from picturesque and informal to formal and axial. Many recognized the incongruity of the Washington Monument Grounds to these new surroundings and made plans to better integrate the grounds into the remainder of the Mall area, although these were not fully realized. The monument grounds also dealt with changes in land use due to the growth in popularity of the automobile and the increase in defense workers in the Capitol due to World War II.

Improvements in circulation patterns continued to be made through the late 19th century. Old roads and walks, such as a road from 14th Street, were repaired and incorporated into a plan introducing new roads and walks, such as a route leading west and north of the monument.[118] The roads on the monument grounds appear to have been mainly gravel or cinder-covered, while the walks were surfaced with plank, gravel with asphaltic bases, or flagstone *(figure 2-29)*.[119]

Much effort went toward re-rolling and re-covering the roads and paths on the grounds during the early 20th century. Other repairs included the installation of new gutters, the re-sodding of worn places in the turf, and the maintenance of trees, shrubs, and other vegetation.[120]

Other improvements were added to the monument grounds. The Coast and Geodetic Survey constructed a new permanent benchmark for the monument to calculate settlement, a 13-foot-6-inch-tall concrete obelisk in a manhole 150 feet south of the monument.[121] As early as 1904, twelve electric arc lights lit the monument grounds.[122] These were supplemented in 1911 by fifty-five new gas lights.[123]

Public Use of the Monument Grounds

As a public park in the nation's capital, the monument grounds became a popular site for large public gatherings. In April 1892 and October 1902, the Grand Army of the Republic camped on the grounds.[124] In August 1895, the Knights of Pythias camped there.[125] When the American Society of Mechanical Engineers held their 1899 annual meeting in Washington, D.C., electric-light lit tours of the monument were offered to participants in the evening.[126]

Although other portions of the Capital began to be used as a place for public debate and demonstration, beginning with Coxey's Army in 1894, most of this type of activity remained focused on the Capitol, the White House, and Pennsylvania Avenue.[127] When Alice Paul and the National American Women Suffrage Association marched on the District of Columbia on March 3, 1913, they focused on Pennsylvania Avenue and its two centers of power, the Capitol and the White House. The marches of Coxey's Army and the suffragettes helped legitimize

political marches in Washington, D.C., as a proper avenue for expressions of free speech. With this, the number and scope of political demonstrations in the capital expanded.

In 1900, the American Institute of Architects held their annual meeting in Washington, D.C., and focused on how to further develop Washington by drawing on the architecture of the 1893 Columbian Exposition.[128] This discussion prompted others to explore ways to beautify and redevelop the city. In 1902, the Chief of Engineers planned improvements to the Mall, Monument Park, and the Potomac Parks. This design left much of the existing, rather picturesque landscape in place, while also introducing a narrow, tree-lined road from the Capitol to the Washington Monument. This plan was widely regarded as inappropriate by architects and landscape architects.[129]

The McMillan Commission and Plan

In 1901, Senator James McMillan of Michigan introduced a bill that formed a Senate Park Commission to develop a new vision for Washington, D.C. The Senate Park Commission, also known as the McMillan Commission, included architects Daniel H. Burnham and Charles F. McKim; landscape architect Frederick Law Olmsted, Jr.; and sculptor Augustus St. Gaudens. For inspiration, the McMillan Commission looked to the 1791 L'Enfant Plan for the city and toured European sites that likely influenced L'Enfant's design. In 1902, they presented to Congress their plan, which came to be known as the McMillan Plan *(figure 2-32)*. It called for a re-landscape and redesign of the ceremonial core, the Capitol Grounds, and the Mall. To do this, the Commission proposed extending the cross-axes west and south of the Washington Monument, consolidating the city railways, alleviating grade crossings, clearing slums, and even designing a municipal office complex in the triangle formed by Pennsylvania Avenue, 15th Street, and the Mall. They also recommended creating a comprehensive recreation and park system to preserve the ring of historic Civil War fortifications around the city.[130] The Washington Monument was the center of an expanded cross-axis where the McMillan Commission envisioned a Monument Garden, the "gem of the Mall system," a formal sunken garden west of the monument. The garden would be accessible by a grand staircase and be filled with bosquets, reflecting pools, fountains, and sculptures. It also would reinforce the north-south axis between the White House and the proposed memorial site south of the Tidal Basin where the Jefferson Memorial now stands.[131]

A lack of funding appropriations prevented immediate implementation of any elements proposed by the McMillan Plan. In 1907, removal of the railroad tracks and depot that had formerly bisected the Mall became the first move toward its realization. Construction of the Lincoln Memorial as the western terminus of the axis from the Capitol began in 1914.[132] The outbreak of World War I and the immediate needs for additional space for defense workers led to the construction of temporary buildings north of the Lincoln Memorial Reflecting Pool.[133]

Though the McMillan Commission was never formally adopted by any governmental body, it served as a guide for two review boards formed in the early 20th century, the Commission of Fine Arts (CFA) and the National Capital Park Commission (NCPC). A 1910 Act of Congress created the CFA, which was charged with giving expert advice to the federal and District of Columbia governments on matters of design and aesthetics as they affected federal interest and the dignity of the nation's capital.[134] As noted in a *New York Times* article in 1912, "its duty is

to advise upon the location of statues, fountains, and monuments in the public places of the District of Columbia, and upon the selection of models and artists for all work of this sort under the authority of the federal government."[135] Their mission expanded in 1911 to include design review of all federal buildings.[136] The NCPC was in 1924 created to acquire new parkland for the city and, in 1926, their function expanded to serve as a planning body with the power to make comprehensive plans for Washington, D.C., and the region.[137]

For several decades, no efforts were made to implement the radical redesign of the Washington Monument Grounds called for in the McMillan Plan. Although the grounds saw an increase in active recreation facilities and buildings were adapted for changing needs, the monument grounds remained largely unchanged from their state in 1889.

When the Washington Monument elevator power source was upgraded from steam to electricity in 1901, an addition to accommodate the new generating unit was made to the boiler house, which then became known as the power house. This addition matched the original building in materials and details. The boilers continued to be used to provide heat for various buildings on the grounds.[138] The power house served this function until 1923 when the monument and grounds were connected to the public power grid.[139] In 1926, the power house was transferred to the Design and Construction Division of the Office of Public Buildings and Public Parks (OPB&PP).[140]

At the request of the WNMS, which maintained its archives in the Monument Lodge, a 30-foot tall flagpole was added to the center of the Monument Lodge roof. The flag was flown daily from this location.[141]

Removal of the U.S. Fish Commission Ponds

Beginning in 1904, the fish ponds northwest of the Washington Monument were abandoned by the U.S. Fish Commission *(figure 2-34)*. The abandoned basin south of the south pond was the first to be filled in 1905.[142] In June 1907, the U.S. Fish Commission relinquished control of the areas on the monument grounds formerly under their control. The OPB&G then leased the southern fish pond to the Commissioners of the District of Columbia for use as a swimming pool.[143] By 1910, the northern fish ponds were filled in with clay and ashes and graded to match the surrounding topography.[144] The OPB&G canceled the Commissioners of District of Columbia lease on the southern fish pond in 1910 and granted them a lease for the strip of land between the former fish ponds and the location of the former hatching ponds to use to build and maintain swimming pools.[145] The southern fish pond was filled, graded, and seeded by August 1911.[146]

Abandonment of the fish ponds led to removal or adaptive reuse of the various small outbuildings associated with the U.S. Fish Commission grounds. In 1907, a small greenhouse near the former fish ponds was moved to the nearby propagating gardens located south of the former alignment of 16th Street below the monument and west of 15th Street and the Department of Agriculture Grounds.[147] In 1910, the Lodge House located on the land between the two former fish ponds was renovated for new visitor uses. Two new restrooms, approached via privet-lined access walks, were installed nearby.[148]

Ornamental Plantings on the Monument Grounds

In 1912 the first cherry trees were planted along the Tidal Basin. This springtime show quickly became an attraction, and in 1935 the Cherry Blossom Festival became an official event.[149]

In 1917, 17th Street, which formed the western boundary of the monument grounds, was extended to the Tidal Basin and the new John Paul Jones Memorial *(figure 2-38)*.[150]

The grounds around Monument Lodge were improved with foundation plantings in November 1931 *(figure 2-41)*. These plantings included layered beds of taller trees and shrubs such as English yew (*Taxus baccata*), English ivy (*Hedera helix*), Japanese cedar (*Cryptomeria japonica*), crape myrtle (*Lagerstroemia indica*), juniper (*Juniperus hibernica*), and glossy abelia (*Abelia grandifolia*), and shorter specimens of azalea (*Rhododendron spp*.), jasmine (*Jasminum rubiflorum*), Japanese barberry (*Berberis thunbergi*), flowering quince (*Cydonia japonica*), hydrangea (*Hydrangea spp.*), rose (*Rosa grootendorst*), and snowberry (*Symphoricarpus vulgaris*).[151]

New Recreational Features Are Added to the Monument Grounds

Recreational use of the monument grounds continued, and expanded during the early 20th century. Most of the active recreational developments were sited in the northwestern quadrant of the monument grounds between 16th and 17th Streets near Constitution Avenue, although there were some fields located to the east of 16th Street. In 1911, three additional baseball diamonds were laid out on the grounds, bringing the total to twelve.[152] Another three diamonds were established in 1914.[153] An athletic field that included a high and broad jump, a pole vault, shot putt, hammer throw, javelin, discus court, and 1/2-mile turf running track was constructed on the monument grounds in 1915. It was widely used by local universities, public and private schools, social organizations, and the police and fire departments. A cricket field laid out on the grounds in the same year did not prove as popular and was removed in 1916.[154] A soccer field was added to the recreation opportunities on the grounds in 1917.[155] In 1920, two football fields and ten clay tennis courts were constructed on the monument grounds *(figures 2-40 and 2-42)*.[156] In 1921, an archery court, a clay basketball court for winter use, and a third football field were established on the grounds.[157] A lacrosse field was added to the recreational offerings of the monument grounds in spring 1922, but because space was restricted in this location, it was moved to West Potomac Park in fall 1922.[158] The year 1924 saw the removal of the three football fields from the grounds in order to construct an additional five tennis courts, two of which were concrete.[159] Three tennis courts were changed from clay to concrete in 1925.[160] By 1927, the number of baseball diamonds on the grounds had decreased to eight, however, they remained popular, attracting 51,749 players and 151,200 spectators that year alone.[161] Changes in the composition of recreation facilities on the grounds continued in 1930: the athletic field and croquet court were abandoned and an eighteen-hole Tom Thumb golf course was opened.[162]

Less active forms of recreation were also popular on the monument grounds. As part of Memorial Day celebrations in 1916, the Washington Monument itself served as the screen for a free public viewing of movies of the great national parks.[163] On June 11, 1927, President Calvin Coolidge and thousands of other well-wishers gathered on the Washington Monument

Grounds to honor Charles Lindbergh after his non-stop trans-Atlantic flight *(figures 2-44 and 2-45)*.[164] As an adjunct to similar events held on the White House Grounds and in West Potomac Park, the Washington Monument Grounds also hosted an annual Easter Monday Easter-egg roll and picnics and children's games. This use continued at least through the 1930s.[165] The 4th of July celebration at the monument grounds was a well-attended annual event by the 1920s, and possibly earlier. Typical celebrations included picnics, concerts by military bands, speeches, fireworks, and in 1929, 1930, and 1931, mock aerial battles above the Washington Monument.[166]

Establishment of the Sylvan Theatre

One major addition to the Washington Monument Grounds that would serve as a focus for many future public gatherings was the Sylvan Theatre. In 1916, Alice Pike Barney, an arts patron, approached Col. W.W. Harts, Superintendent of the OPB&G, with the idea of building an outdoor theatre for productions of Shakespeare and other classical plays. This theatre was originally envisioned as a grassy mound with a screen of trees, and its plan was based on that of an interior theatre, with a main stage, wings, entrance passage and floodlights, spotlights, and flood lights. On June 1, 1917, the Sylvan Theatre was dedicated before a crowd of 15,000 with an opening performance of an allegorical play *(figure 2-37)*.[167]

The Sylvan Theatre served as the location for many concerts, ceremonies, and speeches on the monument grounds in the early 20th century *(figure 2-43)*. One early meeting held by a private group at the Sylvan Theatre was an August 28, 1925, rally and parade of 15,000 Klu Klux Klan members within the city that drew 60,000 participants.[168] Other events held at the Sylvan Theatre included the annual Order of Elks-led Flag Day ceremony and numerous military band concerts.[169] During the 1920s, the theater also hosted an annual Eastertide service and summer vespers.[170]

Flags Are Flown at the Monument's Base

Beginning in 1920, a ceremony commemorating George Washington's birthday was held at the Washington Monument. The first ceremony included placing forty-eight American flags—one for each state in the Union at the time—in a circle around the base of the monument, presentation of wreaths from all the states, and patriotic speeches.[171] The flags were only a temporary feature, removed after each ceremony.[172] Ceremonies to mark Washington's birthday continue to the present day. In 1932, on the bicentennial of Washington's birth, the ceremony marking his birthday was expanded to include delivery of a wreath to the grounds by a blimp *(figure 2-49)*. Also part of this celebration was the creation of Washington's coat of arms in flowers on the grounds.[173]

Building Maintenance and Improvements

In 1927 safety features were added to prevent people from falling down the elevator shaft and out of the pyramidion windows.[174] A grate was added around the elevator and bars were added over the windows of the pyramidion.

After the Washington Monument was completed and opened to the public in 1888, the building continued to require periodic maintenance and cleaning, and was the focus of various

improvement projects. One of these was the replacement of the steam elevator engine with the dynamo housed in the Survey Lodge. Additionally, memorial stones continued to arrive from states that had not previously contributed to the monument. These were often dedicated and inserted with great fanfare. President Calvin Coolidge spoke at the April 15, 1924, dedication of the Arizona memorial stone:

> The placing of a State stone involves a tribute to Washington the man, the leader, the founder. The symbolism is altogether different from that of adding a star to the flag when a new state is admitted. Here today we are paying another tribute to the man whose vision and courage made possible our national existence. It was a fine conception, this, of placing a stone for every State in the Monument to Washington.[175]

Improvements for the visiting public continued to be added to the monument grounds during the 1930s. In 1931, new floodlights were placed around the base of the monument. These were used to illuminate the monument for the first time to celebrate Armistice Day in 1931. Four batteries of lights were installed near the sidewalk around the monument and two searchlights were mounted on the Bureau of Printing and Engraving and the Navy Buildings in West Potomac Park.[176] In 1932, eighty-four benches for visitors were installed around the inner curb of the monument plaza.[177] These benches formed a continuous curved line. They were composed of metal frames with wood slat seats and backs. Similar benches were placed along sidewalks.

Efforts to Implement the McMillan Plan

In 1928, Congress passed a bill appropriating $5 million to fulfill the McMillan Plan. The appropriation was to be administered by a Congressional committee, which hired Frederick Law Olmsted, Jr., as a consulting landscape architect. The bill set aside $30,000 for preparing plans for the improvement of the monument grounds.[178] In 1930, an advisory committee was formed to guide the preparation of these plans.[179]

The stability of the monument and its impact on which plans could be implemented for the grounds surfaced as one item of concern for the advisory committee. The McMillan Plan's proposed creation of a sunken garden west of the monument presented challenges as it would have extended below the monument's foundations and required a large amount of fill on its eastern side. To address the associated engineering concerns, two series of soil borings were conducted on the monument grounds to determine the composition and stability of the sub-soil.[180] These borings revealed that the Monument Garden, if built as planned, would "seriously endanger the stability of the monument."[181] This left two possible solutions: underpin the monument's foundations to bedrock, or disassemble the monument and rebuild it on new foundations that extended to bedrock. Both of these alternatives met with strong disapproval, and the advisory committee recommended abandoning the 1902 Monument Garden as proposed by the McMillan Commission.[182]

Because the character of the monument grounds at this time was incongruous with the formality of the Mall and West Potomac Park, the committee sough other plans for the

monument grounds that would ensure the stability of the monument while integrating the space with the design of the Mall.

Frederick Law Olmsted, Jr., and Henry Hubbard submitted one of the plans considered by the committee. Dubbed the "Informal Plan," it included a circumferential road around the monument and connections to other planned Mall roads. The plan also initially called for groves of elm trees to be planted in curved groves to the north and south of the monument. These trees were later removed from the plan at the request of the Commission of Fine Arts, establishing a *parti* for the Informal Plan that featured a dramatic uninterrupted sweep of greensward punctuated by the central obelisk *(figure 2-46).*[183]

The advisory committee also reviewed a plan prepared by William Delano that came to be known as the "Formal," or "Balustrade," Plan. This plan used continuations of the rows of elms from West Potomac Park and the Mall to connect the monument grounds to the larger Mall area. The trees framed an oval court west of the monument *(figure 2-47).*[184]

Both the Informal and the Balustrade Plans were reviewed by consulting engineers. While these engineers had differing opinions on the feasibility of the plans, they suggested that both would endanger the stability of the monument to some degree. The advisory committee was

> not able to recommend at this time any solution to the problem that entirely satisfies the views of all the authorities involved. A general decision that no new construction work should ever be undertaken within the Monument Lot would solve the problem from an engineering standpoint but would leave an aesthetic situation as to which authoritative opinion seems to be united, namely, that the monument grounds in their present state are incongruous with the Mall development to the east and Lincoln Memorial Grounds to the west. The fact that traffic can not flow undisturbed through the monument grounds from the existing streets makes of this central feature of the city which Washington founded an irritating obstacle and emphasizes its lack of relationship to the other elements of the central area of the National Capital.[185]

As an interim measure, until there was a plan that met the requirements for aesthetics, engineering, and traffic concerns, the Advisory Committee recommended construction, as funds became available, of those elements of the Informal Plan that would not endanger the safety of the monument.[186]

This decision eventually seems to have materialized in the removal of many of the curvilinear roads around the monument in 1936, leaving only a single road to the monument from 15th Street and the roads at the edges of the grounds, leaving the Washington Monument sited on a mostly uninterrupted sweep of greensward *(figures 2-52, 2-53).*[187]

National Park Service Administration of the Washington Monument Grounds

On August 10, 1933, the OPB&PP, and all the lands they controlled, were reorganized as part of the National Park Service (NPS) under the administrative responsibility of the Department of the Interior (DOI).[188]

After the NPS assumed responsibility for the Washington Monument Grounds, some features were adapted to accommodate the needs of the organization. The former power house, which had ceased that use in 1923, began to serve in a new capacity as the Survey Lodge, housing survey crews documenting the boundaries of the new National Parks within the capital. In 1939, the NPS prepared plans for turning the lower story of the Survey Lodge into a chlorination plant.[189]

In the 1920s, those caring for the Washington Monument noticed discoloration of the exterior marble and the development of some cracks. It was not until after the park's transfer to the NPS that funds became available to remedy these and other problems. In 1934, the NPS and Works Progress Administration (WPA) began the extensive task of cleaning and repairing the exterior of the monument. The entire monument was encased with aluminum scaffolding so that joints could be repointed, the exterior of the monument could be cleaned, and cracks in the masonry and problems with the lightning protection system could be repaired *(figure 2-51).*[190]

Recreational Developments of the 1930s

During the 1930s, the Washington Monument Grounds continued to be widely used for recreation. Facilities changed during this time, however, due to site engineering issues. Flood control became necessary to protect the growing number of federal buildings along Constitution Avenue. In 1934, a flood control dyke was planned for the northwestern corner of the monument grounds.[191] Because its installation would necessitate the removal of the swimming pools and other buildings and structures in this area, plans were made in March 1935 to demolish the three swimming pools maintained by the District of Columbia on the monument grounds. It was claimed that the pools were unsanitary and not up to modern standards, but public outcry prevented their demolition until new pools could be built elsewhere, as these pools were used by as many as 1,800 bathers a day who would be deprived of "public bathing experiences" once these pools were demolished.[192]

Public Celebrations on the Monument Grounds in the 1930s and 1940s

Public celebrations also continued to be held on the monument grounds during this period. The Boy Scouts held a National Boy Scout jamboree on the grounds in 1937.[193] A massive war bond rally, "Back the Attack" took place there in September 1943 *(figure 2-67).* Due in part to patriotic sentiment during World War II, as well as the presence of many members of the Armed Services in the capital, the annual 4th of July celebrations on the grounds were very well-attended *(figure 2-69).*

Monument Lodge Improvements

After 1930, the Monument Lodge underwent a series of alterations to meet the needs of the visiting public. In 1931, restrooms were enlarged to include the space formerly occupied by the office and store room.[194] In 1942, the interior of the main central room of the lodge was remodeled to house a display featuring a small collection of materials relating to the life of Washington. The main central room also accommodated the operations of a concessionaire offering food and drink to visitors.[195]

The Mall Development Project of the 1930s

Between 1933 and 1937, the NPS conducted the Public Works Mall Development Project, which removed many of the temporary buildings sited on the monument grounds during World War I, including tempos and the heating plant across the center of the Mall that framed the axial view from the Capitol west through a pair of tall smokestacks. The project also helped to shape the landscape as envisioned in the L'Enfant and McMillan plans. When completed, the Public Works Mall Development Plan had succeeded in establishing a large central open space flanked by four rows of elms and four roads that paralleled the Mall cross-axis.[196] This work essentially formed the basis for the Mall as it exists today, particularly its character as a park-like setting for national memorials and buildings.

The Jefferson Memorial

In 1934, planning began for the Jefferson Memorial to be located on the south side of the Tidal Basin. This memorial completed the termini of the cross-axis envisioned by the McMillan Commission for the ceremonial core of Washington. The John Russell Pope-designed Jefferson Memorial was dedicated in 1943.[197]

Establishment of Independence Avenue

As automobile traffic increased in the District of Columbia and surrounding region, new roads were needed to direct and control traffic. One of the roads proposed was a dual highway system through West Potomac Park and the monument grounds. This road, Independence Avenue, roughly followed the path of B Street South east of 15th Street. West of 15th Street, it followed a curvilinear path towards the Memorial Bridge. The west-bound traffic lane followed a path through the monument grounds and West Potomac Park, while east-bound traffic was carried over the northern bay of the Tidal Basin on the Paul Cret-designed Kutz Bridge. The dual highway approach allowed retention of the form of the Tidal Basin in this area, which was desirable for aesthetic and engineering reasons. Independence Avenue became a boundary that separated the southern portion of the monument grounds from the northern portion. Construction began on Independence Avenue and the Kutz Bridge in 1942, and the new road system opened to traffic in July 1943 *(figure 2-56).*[198]

World War II Adaptations to the Monument Grounds

By 1941, many of the temporary buildings had been removed from the Mall, although those to the north of the Reflecting Pool remained. To meet the rapidly expanding needs for defense office space as the United States entered World War II, these buildings were recommissioned and additional temporary buildings were built south of the Reflecting Pool, on the Washington Monument Grounds, and on the Mall beginning in 1942.[199]

On April 28, 1942, the NPS transferred 22.17 acres of the Washington Monument Grounds to the Public Buildings Administration, "for the purpose of constructing thereon a temporary building for National Defense purposes." This building was to be removed within a year of the end of the war.[200]

Three temporary federal office buildings—T-3, T-4, and T-5—were thereafter built on the northwest portion of the monument grounds. They were fenced off from the remainder of the grounds and a parking lot for workers in these buildings was built at 16th Street *(figures 2-57*

and 2-68).[201] The lot formed an elongated oval with an entrance and exit point at Constitution Avenue, and bays to the west and east. A walk ran down the center of the oval. In 1943, Building T-5 was expanded with three additional wings and an enlarged parking lot.[202] Even though these buildings occupied much of the land once used for active recreation, recreation continued to be an important use of the grounds *(figure 2-64).*

1943 – 2003: PLANNING FOR THE FUTURE AND ADAPTING TO CHANGING NEEDS

With the dedication of the Jefferson Memorial in 1943 and the completion of the cross-axis envisioned by the McMillan Plan, attention turned toward developing the Washington Monument Grounds. The desire to remove automobiles and the World War II temporary buildings to better integrate the monument grounds into the larger Mall led to several planning proposals, none of which was fully implemented. In contrast to the many patriotic events held on the monument grounds and the Mall before and during World War II, in the 1960s and 1970s the Mall and the monument grounds, served as a back drop for numerous rallies and marches protesting government policies ranging from civil rights to war. In the late 1990s, increased terrorism and threats against American interests and landmarks altered the security and protection needs of the Washington Monument and its visitors. The monument also underwent an extensive exterior restoration during this period.

Even while temporary buildings occupied a portion of the monument grounds, improvements continued to be made to other portions of the grounds. In 1944, a permanent stage was built at the Sylvan Theatre. This stage was four feet tall, rectangular in plan and supported by iron girders *(figure 2-70).*[203] In 1976, the Sylvan Theatre underwent a major renovation, with the construction of the existing proscenium arch and enclosed dressing rooms.[204]

In 1948, plans were made to construct a small two-counter concession stand on the west elevation of the Monument Lodge *(figure 2-71).*[205] This concession stand was expanded in 1955 to include additional serving features, a larger canopy, and a fenced dining area.[206] In 1963, the present cinder block, shed-roof addition was constructed along the west elevation of the Monument Lodge. The addition also featured an aluminum awning to provide summer shade *(figure 2-76).*[207]

From 1991 to 1993, the Survey Lodge was rehabilitated to repair termite damage and modernized. The original slate roof and cupola that had been removed by the early 20th century were restored as part of this project.[208]

Repair and Maintenance of the Washington Monument

In 1964, the Washington Monument was cleaned for the second time. The cleaning was conducted using an exterior rigging system, rather than encasing the monument with scaffolding as was done in the 1934 cleaning. As part of this operation, the exterior marble was cleaned and cracks and spalls were repaired.[209]

The Washington Monument also underwent an extensive restoration, repair, and upgrading in the 1990s. Remodeling of the interior lobby from 1992 to 1994 included the addition of an Egyptoid elevator entry reminiscent of Robert Mills' original entablatures for the monument's

entrances.[210] In 1997, the monument's electrical, mechanical, heating, communications, and elevator systems were upgraded and repaired as part of the first phase in the Washington Monument restoration titled "It Stands for All."[211] Phase II began in 1998 with the construction of a Michael Graves-designed aluminum scaffolding, enclosed within a blue-gray mesh with horizontal and vertical stripes that resembled ashlar stone joints, around the entire monument. The exterior was then cleaned and repaired for the third time in the monument's history *(figure 2-88).*[212]

Flags at the Base of the Washington Monument

Throughout the 1940s and 1950s, a ring of flags was temporarily installed around the base of the monument to accompany many public functions including Washington birthday celebrations, Memorial Day, 4th of July festivities, patriotic rallies, and other special occasions, such as a 1954 Catholic mass celebrating the Marian Year *(figure 2-73).*[213] Despite proposals to fly the flags on a daily basis, they continued to be raised for each event and subsequently dismantled because the wooden poles used were deemed not acceptable for permanent display. In 1957, the NPS prepared plans for the permanent installation of fifty flagpole bases in a circle at the outer edge of the drive around the monument *(figure 2-75).*[214] Forty-eight flagpoles were installed and used for the first time on February 22, 1958, as part of the Washington birthday celebration. A 49th flag was unveiled on July 4, 1959 and the 50th flag was raised on July 4, 1960, symbolizing the last two states to join the United States, Alaska and Hawaii.[215]

Once these permanent flagpoles were installed, flags were raised and lowered daily, but without fanfare or ceremony. Many visitors and officials suggested that a military honor guard should be used to conduct the flag raising and lowering each day. However, this recommendation was not pursued due to the financial implications and the time commitment that would have been required of military personnel. In spring 1970, a formal retreat ceremony by park staff was initiated.[216] This continued until July 4, 1971, when President Nixon issued a Presidential proclamation stating that the flags around the Washington Monument were to fly twenty-four hours a day.[217]

Cherry Tree Plantings

While the first cherry trees were planted around the Tidal Basin in 1912, very few stood on the monument grounds until 1955 when 124 Yoshino cherry trees were planted in clusters around the Sylvan Theatre *(figure 2-74).*[218] In 1966, two groves of Yoshino cherry trees were added north of the monument, one west of the 16th Street parking lot and the other to its east *(figure 2-78).*[219]

Although originally programmed to occur within a year of the end of the war, the World War II tempos were not removed from the monument grounds until 1964 *(figure 2-72).*[220]

New Visitor Services in the 1960s and 1970s

In 1966, information kiosks were built on the Washington Monument Grounds, one near the 16th Street parking lot and the other near the Monument Lodge.[221] An Interim Development Plan for national bicentennial celebrations included construction of the temporary Kodak

Theatre and a permanent new comfort station. Both of these facilities were built in the southeast corner of the grounds, near the Sylvan Theatre. The Kodak Theatre operated from April to October 1976, showing visitors a twelve-minute film on the life of George Washington. It was removed from the grounds after the bicentennial festivities were completed *(figure 2-82).*[222]

The German-American Friendship Garden

In 1983, as part of celebrations for the German-American Tercentennial, a Presidential Commission planning for the event proposed the establishment of a German-American Friendship Garden. The land around the 16th Street parking lot on the monument grounds was set aside for the garden in 1983, but work did not actually begin until 1987 as a result of consultation with various reviewing agencies. Oehme Van Sweden and Associates designed the garden with identical east and west gardens flanking a central lawn. Each garden contained a central twenty-foot radius circular terrace with a fountain. The fountains were circled with integral benches. The plantings included German and American flowering perennials and small flowering trees, such as fragrant ash (*Fraxinus spp*).[223] The German-American Friendship Garden was completed in July 1988 *(figure 2-86).*[224]

Master Plans and Development Concept Plans

Improvements were made to the Washington Monument Grounds as part of the NPS Mission 66 program. In 1958, eight red aircraft warning lights were installed in the pyramidion, one above each exterior window. In the same year, construction of the current exterior floodlighting system took place and included four inner concrete vaults for lighting the lower sixty feet of the monument, four large concrete bunkers with hydraulically-powered aluminum covers at the outer edge of the circular drive, and eight search lights mounted on pedestals 568 feet from the monument.[225] On February 22, 1960, cars were prohibited from driving around the monument, and the plaza and drive were to be converted into a pedestrian walkway.[226]

The Washington Mall Master Plan, produced by Skidmore, Owings and Merrill (*figure 2-84*), was intended to guide future development of the Mall and was approved by the NPS in 1965. Its central tenets included: removing existing through-traffic roads; developing special sightseeing vehicle routes; fully developing existing conditions; using a complete landscape concept to unify the Mall; emphasizing the north-south and east-west axes; and clearing the Mall of temporary facilities. To compensate for the removal of parking around the monument, the 16th Street parking lot off Constitution Avenue that had been built with the temporary federal office buildings was to be reserved for monument visitors.[227]

Other planned, but not executed, Mission 66 program elements for the monument included construction of a new plaza and pedestrian paths; extending the North and South Reflecting Pool Drives through the monument grounds to connect with Jefferson and Madison Drives on the Mall, and relocation of the Sylvan Theatre.[228]

In 1973, a Washington Monument Visitor Facility Comprehensive Design Program investigated the possibility of constructing an underground visitors center around the Washington Monument's foundations. It proposed alterations to the grounds, including

rehabilitation of the Survey Lodge and continued use of that building for offices, rehabilitation of Monument Lodge to serve as a tour bus ticketing facility, removal of its concession stand addition, and constructing an information kiosk and underground restrooms in the southeast corner of the grounds. None of these proposed items were ever implemented.[229]

A 1974 Interim Development Plan for the monument grounds proposed implementing a ticket system for entry into the monument, widening 15th Street to reduce congestion caused by Tourmobile and charter buses, and eliminating the 16th Street parking lot from the grounds. All of these goals were in accordance with the principles of the 1965 Mall Master Plan.[230]

In 1981, a Development Concept Plan, a "refinement of elements in the 1966 and 1973 Skidmore, Owings, and Merrill plans that applied specifically to the monument grounds,"[231] was prepared based on adherence to the spirit of the L'Enfant Plan. This plan was an attempt to remedy the results from the ineffectiveness of past plans:

> None of the many plans for the Washington Monument Grounds has been fully implemented and because of this the grounds today lack the elegance and definition of all other areas in the monumental core. Design continuity is lacking, graceless and unsymmetrical features diminish visual quality and modern structures and facilities intrude on vistas and detract from the site's integrity. The introduction of new and harmonious landscape elements is essential if the monument grounds are to fulfill their potential as a focal attraction.[232]

The 1981 plan recommended new paths, including two parallel paths from the monument plaza west to 17th Street and two diagonal paths east from the plaza towards 15th Street; a new plaza at the base of the monument; and a realignment of 15th Street. It also called for the removal of the Monument Lodge, as it disrupted the east-west axis from the monument to the Capitol.[233] Although the Commission of Fine Arts approved construction of the four new paths leading east and west from the monument plaza, only the two paths west were constructed with financial support from the National Society of Professional Engineers. These were completed in 1986.[234] Because the paths followed the natural topography and contours of the site, little grading was necessary for their construction *(figure 2-85)*.[235]

The 1981 Development Concept Plan was revised in 1989 to include the restoration of Monument Lodge and its conversion into a tourmobile drivers' rest stop and the construction of a visitor's facility near the Sylvan Theatre. To minimize the potential visual intrusion of this new facility, it was to be built into the mound at the base of the monument. The monument plaza was redesigned to be a grassy mound. The alignment of 15th Street was planned to be realigned, but in a manner that reflected the natural curve of the mound.[236]

Another Development Concept Plan prepared for the site in 1993 *(figure 2-87)* reiterated many of the goals of earlier plans and included work to be accomplished in seven phases. This work included realigning Jefferson and Madison Drives, completed in 1997; rehabilitating the landscape between 15th Street and the monument to meet accessibility standards; removing the 16th Street parking lot; and constructing new, accessible walks from the monument to the other sections of the grounds. It also recommended renovation of the monument plaza with new

seating and lighting; reconfiguration of the Survey Lodge parking lot; replacement of the Sylvan Theatre; and construction of an underground visitor's center, entered through a rehabilitated Monument Lodge.[237]

Events and Activities Associated with the Monument Grounds

During World War II, many patriotic events were held on the monument grounds. The 1944 'Cavalcade of Freedom' 4th of July program was attended by an estimated 250,000 people *(figure 2-69).*[238] Later that same year, 10,000 members of the all-female division of the U.S. Navy known as the WAVES gathered to celebrate their second anniversary.[239] As part of the Veterans' Day celebrations, the floodlights for the Washington Monument and Capitol were turned on for the first time since the beginning of the war. In November 1945, Admiral Nimitz Day festivities on the grounds included a military parade.[240] Through the 1960s, the grounds also hosted a summer Shakespeare Festival, music concerts, kite flying contests, 4th of July fireworks, and Washington birthday events.[241]

Festivities marking the centennial of the start of construction for the Washington Monument in 1948 extended over three days and included fireworks, military band concerts, speeches and lectures on historic topics.[242]

Although many of the active recreation facilities had been removed from the grounds, a variety of activities still occurred in various locations throughout the grounds *(figure 2-83).* In addition, many somewhat frivolous stunts were performed at the Washington Monument during the mid-20th century. These included an acrobat walking down the steps on his hands and on stilts, and walking up the steps piggy-back.[243]

Large Public Gatherings on the National Mall Beginning in the 1960s

As public sentiment began to turn against the administration's stance on war, civil rights, and other social topics in the 1960s, the monument grounds and much of the rest of the Mall area became a popular destination for holding rallies and protest marches. In 1961, the Catholic Archdiocese held a Prayer for Peace Program that was attended by 125,000.[244] The Washington Monument served as a gathering place for the estimated 200,000 marchers who participated in the August 28, 1963, March on Washington for Jobs and Freedom. Once assembled at the monument grounds, the participants marched down Constitution and Independence Avenues to the Lincoln Memorial where they heard from the ten leaders of the march, including Dr. Martin Luther King who gave his "I Have a Dream" speech. This march was significant because it was one of the first to shift focus from the act of marching to the speeches given to the marchers. This pattern would be followed by many of the large rallies held on the Mall in the late 20th century. This march was also held away from the traditional power centers of earlier marches—the Capitol, Pennsylvania Avenue, and the White House. By holding the march on the Mall, security and crowd control were easier for the authorities and the marchers projected a sense of power by making the authorities come to them.[245]

During the late 1960s and early 1970s, as the anti-war movement grew, the monument grounds, and other locations on the Mall were the site of protests, including the November 15, 1969, Peace Moratorium. This event drew an estimated 250,000 to the monument grounds

(figure 2-79).[246] The Spring Offensive of 1971, three loosely coordinated demonstrations by different anti-war groups, included a National Peace Action Coalition March against the War on April 24th. This more traditional march traveled along Pennsylvania Avenue to the White House. After the largely peaceful march, a crowd gathered on the monument grounds waiting for an evening rock concert. Some marchers began removing flags from the flagpoles and were arrested by the U.S. Park Police. Finding their van surrounded by the crowd when they attempted to leave, the U.S. Park Police retreated inside the monument while the marchers removed all the flags, broke up benches, and started bonfires. Such destruction was not typical of area marches.[247]

In the 1980s, the Washington Monument came under attack on several occasions. In December 1982, anti-nuclear activist Norman Mayer held a ten-hour siege of the monument, threatening to blow it up.[248] In November 1985, another man drove an eighteen-wheeler into the base of the Washington Monument. The monument was only lightly damaged.[249]

Many of the large gatherings on the Mall in the late 20th century extended on to the monument grounds, including the 1993 March for Lesbian, Gay and Bi Equal Rights and Liberation, the 1995 Million Man March, and the 1996 AIDS Memorial Quilt display.[250]

National Security Concerns Beginning in the 1990s

The bombings of the American Embassies in Kenya and Tanzania in August 1998 resulted in construction of a ring of concrete Jersey barriers around the base of the monument as a temporary vehicle impediment system.[251]

In July 2001, the National Park Service developed a proposal to replace the Jersey barriers with a ring of 370 bollards 185 feet from the monument. The NCPC did not approve this design proposal.[252]

In the fall of 2001, an interim security addition was built adjoining the east elevation of the monument to allow for screening of visitors and their belongings.[253] In the fall of 2001, proposals were sought for developing a permanent vehicular barrier system around the monument and for constructing a visitor screening facility. The NPS chose a design by the Olin Partnership for an underground visitor facility entered through a rehabilitated Monument Lodge and connected to the monument through a tunnel. The proposed site design called for two twelve-foot-wide walkways with low retaining walls looping around the monument to act as vehicle barriers.[254]

In February 2002, the NCPC, CFA, and the Historic Preservation Review Board (HPRB) for the District of Columbia individually granted the NPS conceptual approval for construction of a permanent visitor and security facility on the monument grounds. The facility, the concept for which was first proposed in the 1993 Development Concept Plan, was to be built underground and include an entry tunnel into the monument.[255] Other permanent security improvements included in the approved plan were the landscaped vehicle barrier system of low-walled terraces and walkways proposed in the Olin concept plan for vegetation, and removal of the above-ground queuing area and the interim security addition from the monument plaza. The plan also featured rehabilitation of the Monument Lodge and

construction of a compatible addition to serve as an entry to the new underground screening facility; subtle regrading of the monument's mound; rehabilitation of the monument plaza; removal of the 16th Street parking lot and completion of the German-American Friendship Garden; preservation and interpretation of the Jefferson Pier; and preservation of the existing recreation fields.[256] It is anticipated that these improvements will be completed in 2004.

ENDNOTES

[1] Robert L. Humphrey and Mary Elizabeth Chambers, *Ancient Washington: American Indian Cultures of the Potomac Valley*, 2nd ed. (George Washington University: Washington, 1985).
Ancient Washington: American Indian Cultures of the Potomac Valley (Washington: George Washington University, 1985), 10-12; Stephen Potter, *Commoners, Tribute, and Chiefs, the Development of the Algonquian Culture in the Potomac Valley* (Charlottesville, VA: University of Virginia Press, 1993).
[2] Department of Anthropology, *Database Report for Accession Number 32872, Washington Monument*. Smithsonian Institution, National Museum of Natural History. Washington. 6 May 2003. The findings of two archaeological reports conducted since 2003 are developed in greater detail in the Executive Summary.
[3] Humphrey and Chambers, *Ancient Washington*, 23-25. These artifacts include chips and flakes, point, knife and scrapers. Further details on the original location of these artifacts or their method of collection are not known.
[4] National Capital Planning Commission (NCPC) and Frederick Gutheim, *Worthy of the Nation: The History of Planning for the National Capital* (Washington: Smithsonian Institution Press, 1977), 22-23.
[5] Elizabeth J. Barthold, *L'Enfant-McMillan Plan of Washington, D.C.; HABS No. D.C.-668,* Sara Amy Leach, ed. (Washington: National Park Service, Historic American Buildings Survey (HABS), 1993), 4. This population included 37 free white males over 16 years of age, 33 free white males under 16 years of age, 53 white females, four other free persons, and 591 slaves.
[6] Elizabeth J. Barthold, *The National Mall and Monument Grounds (Reservation Numbers 2, 3, 3A, 3B, 4, 5, 6, 6A*); *HABS No. D.C.-687* (Washington: National Park Service, HABS, 1993), 1-2.
[7] Barthold, *L'Enfant-McMillan Plan*, 4.
[8] Ibid., 8-9. The location and function of these reservations was first shown on Andrew Ellicott's 1792 plan, but their boundaries were first delineated on James R. Dermott's 1795-96 "Tin Case Map." Reservation No. 1 included the grounds of the President's House, including the site of today's Ellipse, and Treasury and Executive Office Buildings. Reservation No. 2 extended from 1st Street E to 14th Street W encompassing today's Capitol Grounds and much of the Mall. Reservation No. 3 included the land south of Tiber Creek between 14th and 17th Streets, the current Washington Monument Grounds.
[9] Barthold, *National Mall and Monument Grounds*, 1-2.
[10] Dorothy S. Provine, comp., *Preliminary Inventory of the Records of the Government of the District of Columbia, Record Group 351* (Washington: National Archives and Records Service, 1976), 27-28.
[11] NCPC and Gutheim, *Worthy of the Nation*, 36.
[12] Provine, *Record Group 351*, 28.
[13] Barthold, *L'Enfant-McMillan Plan*, 10.
[14] Barthold, *National Mall*, 5-6. Until 1850, two large slave pens were located on the Mall across from the Smithsonian. See Therese O'Malley, "'A Public Museum of Trees:' Mid-Nineteenth Century Plans for the Mall," in *The Mall in Washington, 1791-1991, Second Edition*. Ed. Richard Longstreth (Washington: Center for Advanced Study in the Visual Arts and the National Gallery of Art Publishing Office, 2002), 62.
[15] Silvio A. Bedini, *The Jefferson Stone* (Frederick, MD: Professional Surveyors Publishing Co., 1999), 34, xiii. The idea of a national prime meridian dates to 1791 when consideration was paid to making the center of the Capitol the starting point for such a standard. In 1804, President Jefferson hired surveyors Isaac Briggs and Nicholas King to re-survey the earlier prime meridian, but passing it in a north-south direction through the President's House, rather than the Capitol. Jefferson wanted to establish an American prime meridian so that the young country would no longer need to rely on a prime meridian located in another country, such as Britain's Greenwich Prime Meridian. Jefferson also saw the establishment of a national meridian as a way to regulate time, and to assist in the mapping, survey, and settlement of western lands. Ibid., 12-14.

[16] Ibid., 138-139. Because the Capitol was not actually visible from the site of the Jefferson Stone, Jefferson installed the Capitol Stone as a way to establish a sight line with the President's House that would guide placement of the Jefferson Stone. Ibid., 32.
[17] Ibid., 34. Tradition has it that the Jefferson Stone was set in place December 18, 1804. U.S. Army Corps of Engineers, *Annual Report to the Chief of Engineers, U.S. Army* (Washington: Government Printing Office, 1898) and Donald C. Phanz, "Washington Monument," National Register Documentation of Existing National Register Property (Washington: National Park Service, 1980), item 8, page 1. This is the date inscribed on the current Jefferson Stone Monument as the date of erection of the original Jefferson Stone. Bedini's recent study suggests that the original Jefferson Stone was actually erected in October 1804 and the date of December 18, 1804, reflects the date of the bill sent to President Jefferson by surveyors Briggs and King for erection of the three meridian stones. See Bedini, *The Jefferson Stone,* 111.
[18] Ibid., 139.
[19]Frederick L. Harvey, *History of the Washington National Monument and the Washington National Monument Society* (Washington: Government Printing Office, 1903), 21-23.
[20] Ibid., 24. Bonded agents who received a 10-percent commission on donations collected the funds.
[21] Quoted in Pamela Scott, "Robert Mills and American Monuments." In *Robert Mills, Architect*. Ed. John M. Bryan (Washington: American Institute of Architects Press, 1989), 158.
[22] Select Committee on Washington National Monument, *Annual Report*, H. R. Rep. 43-485 (1874), at 2.
[23] Pamela Scott, "'This Vast Empire:' The Iconography of the Mall, 1791-1848," in *The Mall in Washington, 1791-1991, Second Edition*. Ed. Richard Longstreth (Washington: Center for Advanced Study in the Visual Arts and the National Gallery of Art Publishing Office, 2002), 48-49.
[24] Barthold, *National Mall*, 7.
[25] In May 1844, the House Committee on Public Buildings and Grounds proposed constructing a monument to Washington on part of Reservation No. 2 bounded by B Street, 7th Street, 12th Street, and the Canal, and near the Patent and Post Office Buildings, to be built according to a design proposed by the Committee on Public Buildings and Grounds, using funds collected by the Washington National Monument Society and from the sale of public lots. Congress did not act upon this resolution. Harvey, *Washington National Monument Society*, 35-37.
[26] There is evidence for at least three designs for a Washington Monument in Mills' 1836-1840 journal. Scott, "American Monuments," 158.
[27] Ibid.
[28] George J. Olszewski, *A History of the Washington Monument 1844-1968* (Washington: National Park Service, Office of History and Historic Architecture, Eastern Service Center, 1971), 3-4.
[29] Harvey, *Washington National Monument Society*, 41.
[30] H. R. Rep. 43-485 (1874), at 2-3. The area has since been renumbered and "currently comprises Reservation 2. See National Park Service, *Cultural Landscape Inventory: Washington Monument Grounds and Washington Monument* (Washington: National Park Service, 2009), 2.
[31] The Jefferson Stone, erected in 1804, marked the original intersection; Barthold, *National Mall*, 7.
[32] Louis Torres, *"To the Immortal Name and Memory of George Washington": The United States Army Corps of Engineers and the Construction of the Washington Monument* (Washington: Government Printing Office, 1984), 15-16.
[33] Scott, "Iconography of the Mall," 52.
[34] Scott, "American Monuments," 168.
[35] "Journal of Meeting of Board of Managers of Washington National Monument Society." 29 August 1848, 236. Entry 418, Proceedings of the Society, 1833-1951, Record Group 42, Records of the Washington National Monument Society, 1833-1951National Archives and Records Administration, Washington, D.C.
[36] "Journal of Meeting of Board of Managers of Washington National Monument Society." October 3, 1848, 240. Entry 418, Proceedings of the Society, 1833-1951, Record Group 42, Records of the Washington National Monument Society, 1833-1951, National Archives and Records Administration, Washington, D.C.
[37] Torres, *Corps of Engineers*, 15.
[38] Aaron V. Wunsch, *Washington Monument, HABS No. D.C.-428* (Washington: National Park Service, HABS, 1994), 3.
[39] Robert Mills to Board of Managers of Washington National Monument Society, 1 November 1848;

Entry 418, Proceedings of the Society, 1833-1951, Record Group 42, Records of the Washington National Monument Society, 1833-1951, National Archives and Records Administration, Washington, D.C.
[40] Harvey, *Washington National Monument Society*, 43-44.
[41] Ibid., 130.
[42] Ibid., 328.
[43] Quoted in O'Malley, "Public Museum of Trees," 62.
[44] Ibid., 68-69.
[45] Scott G. Shultz, *A General History of the West Potomac Park and Washington Monument Grounds Cultural Landscapes* (Washington: National Park Service, National Capital Parks-Central, 1995), 6.
[46] Torres, *Corps of Engineers*, 17.
[47] "Inventory of Property Belonging to the W. N. Monument Society," 20 March 1855, Entry 432, Correspondence, Record Group 42; National Archives Building, Washington, D.C.
[48] Torres, *Corps of Engineers*, 20.
[49] Harvey, *Washington National Monument*, 49-50.
[50] Frank Freidel and Lonnelle Aikman, *George Washington: Man and Monument* (Washington: Washington National Monument Association, 1973), 39.
[51] Harvey, *Washington National Monument Society*, 52-54.
[52] Phanz, "Washington Monument," item 8, page 1.
[53] One source states that two rows, or four vertical feet, of masonry were added during the Know-Nothing tenure. See Harvey, *Washington National Monument Society*, 63. A second source states that thirteen rows, or twenty-six vertical feet were added. See Torres, *Corps of Engineers*, 27.
[54] Wunsch, *Washington Monument*, 8.
[55] Speech of Hon. Robert C. Winthrop, at the dedication of the Washington Monument, 21 February 1885, quoted in Harvey, *Washington National Monument Society*, 239.
[56] Lt. Bickworth to Washington National Monument Society, 7 May 1861, Entry 436, Records Relating to the Design and Construction of the Monument, Monument Grounds, and Offices of the Society, Record Group 42, Records of the Washington National Monument Society, 1833-1951, National Archives and Records Administration, Washington, D.C.
[57] Olszewski, *Washington Monument 1844-1968*, 24.
[58] "The Flag Raising on the Monument," *Daily Intelligencer*, 28 February 1862.
[59] Barthold, *National Mall*, 11.
[60] The Office of Public Buildings and Public Grounds (OPB&PG) was created in 1867 to oversee control of federal lands and buildings within the District of Columbia. See Barthold, *L'Enfant-McMillan Plan*, 21.
[61] Ibid., 5-6.
[62] U.S. Army Corps of Engineers, *Annual Report to the Chief of Engineers, U.S. Army* (Washington: Government Printing Office, 1872).
[63] U.S. Army Corps of Engineers, *Annual Report*, 1872, 1873, 1875, 1879.
[64] U.S. Army Corps of Engineers, *Annual Report*, 1873.
[65] U.S. Army Corps of Engineers, *Annual Report*, 1876.
[66] U.S. Army Corps of Engineers, *Annual Report*, 1877.
[67] U.S. Army Corps of Engineers. *Annual Report*, 1898. The Jefferson Stone Marker currently on the Monument Grounds originally carried the inscription: "POSITION OF JEFFERSON PIER ERECTED DEC. 18. 1804. RECOVERED AND RE-ERECTED DEC. 2, 1889. BEING THE CENTRE POINT OF THE DISTRICT OF COLUMBIA." At some unknown date, the incorrect line "BEING THE CENTRE POINT OF THE" was crudely carved out. See Bedini, *Jefferson Stone*, 110-111.
[68] Helen Dillon, "U.S. Capitol Gatehouses and Gateposts (Former)," *National Register Nomination* (Washington: National Park Service, 1972), item 8, page 1. The stone gatepost currently on the southwest corner of 15th Street and Constitution Avenue was moved to this location in 1931 to accommodate the widening of Constitution Avenue. This stone gatepost replaced a deteriorating brick gatepost that was demolished. See *Annual Report of Director of Public Buildings and Public Parks of the National Capital* (Washington: Government Printing Office, 1931), 69.
[69] Barthold, *National Mall*, 11.

[70] After the death of James Madison, second president of the Washington National Monument Society, the society had as its president ex-officio the President of the United States. The first to hold this honor was Andrew Jackson. Harvey, *Washington National Monument Society*, 25; ibid., 74.
[71] David D. Porter to Washington National Monument Society, November 19, 1874, quoted in Harvey, *Washington National Monument Society*, 83.
[72] U.S. Public Law No. 45-129 (1876).
[73] Harvey, *Washington National Monument Society*, 90. This Joint Commission was comprised of the President, the Supervising Architect of the Treasury, the Architect of the Capitol, the Chief Engineer of the U.S. Army and the First Vice President of the Washington National Monument Society.
[74] Torres, *Corps of Engineers*, 37, 52-54. The latter alternative, which suggested completing the monument to a wholly new design had much public and Congressional support, although the Washington National Monument Society vehemently opposed this suggestion. Artistic tastes had changed since construction of the monument began and its simple obelisk form was out of favor. Many favored a more elaborately decorated monument. Mills' design for a National Pantheon encircling the base of the monument was widely disliked and it was not seriously considered further.
[75] In 1874, First Lt. William Marshall studied the foundations and reported to the Joint Commission that the foundations were secure and did not need to be strengthened. He did recommend a reduction in height to 400 feet and lessening the load on the foundations by using brick to build the walls above 250 feet and building a roof of cast-iron plates. See Select Committee on the Washington National Monument, H. R. Rep. 43-485 (1874), at 4-6.
[76] Work began on strengthening the foundations in January 1879, and was finished on May 29, 1880. See Joint Commission for Completion of the Washington Monument, *Annual Report*, H. R. Doc. 47-19 (1881), at 2.
[77] U.S. Army Corps of Engineers, *Annual Report*, 1880.
[78] H.R. Doc. 47-19 (1881).
[79] Torres, *Corps of Engineers*, 59, 65. In his search for qualified men to carry out this delicate operation, Casey recruited miners from Nevada and from the concurrent tunneling operation for Baltimore's water supply.
[80] Ibid., 56-57.
[81] Quoted in Harvey, *Washington National Monument Society*, 97.
[82] H.R. Doc. 47-19 (1881).
[83] Lt. Col. Thomas Lincoln Casey, Engineer in Charge, to Gen. H. G. Wright, Chief of Engineers, 4 May 1882; vol. 3, p. 64, Letters Sent, Entry 495, Records of the Engineer in Charge, 1876-1892, Record Group 42, Records of the Joint Commission for the Completion of the Washington Monument, 1876-1892, National Archives and Records Administration, Washington.
[84] Wunsch, *Washington Monument*, 9.
[85] Joint Commission for the Completion of the Washington Monument, *Annual Report*, H. R. Doc. 46-9 (1880), at 2-4.
[86] Ibid.
[87] Joint Commission for the Completion of the Washington Monument, *Annual Report*, H. R. Doc. 48-8 (1884), at 2-4.
[88] Bernard R. Green, Civil Engineer, "Notes on Project for a Marble Pyramidion for the Washington Monument, represented in four sheets of drawings on file in the Engineer Office," 4 August 1884, Box 41, folder 21, Casey Family Papers, Society for the Preservation of New England Antiquities, Boston.
[89] Torres, *Corps of Engineers*, 81.
[90] These lightning rods were connected to each other and to the interior iron columns, which were grounded to a well dug in the center of the foundation. Torres, *Corps of Engineers*, 91-92.
[91] Harvey, *Washington National Monument Society*, 104-105.
[92] Quoted in ibid., 224.
[93] Quoted in ibid., 242.
[94] Ibid., 107.
[95] While ninety-two memorial stones, or presentation blocks as Casey referred to them, were inserted into the monument before construction stopped in 1858, eight of these were removed as part of the preparatory work for restarting construction. Casey did not add any of the remaining unused blocks to the interior during construction, but instead made provisions to do this work after the obelisk was completed. See Torres, *Corps of Engineers*, 93,

and Joint Commission for Completion of the Washington Monument, *Annual Report*, H. R. Doc. 49-6 (1885), at 3-4.
[96] Torres, *Corps of Engineers*, 90-91, 95.
[97] Col. Thomas Lincoln Casey, Engineer in Charge, Advertisement and Specifications for Boiler House at the Washington Monument, 3 October 1885, Box 2, Contracts, Entry 512, Records of the Engineer in Charge, 1876-1892, Records of the Joint Commission for the Completion of the Washington Monument, 1876-1892, Record Group 42; National Archives and Records Administration, Washington.
[98] H. R. Doc. 49-6 (1886), at 4-5.
[99] U.S. Army Corps of Engineers, *Annual Report*, 1889.
[100] H.R. Doc. 49-57 (1887), at 2-3.
[101] The contract for this building allowed the contractor to use "stone now on the grounds within 150 feet of the site of the building." The contractor was also permitted to take advantage of "the large quantity of marble and granite on the grounds, any part of which the contractor may utilize for this work without charge, if he desires to do so. The granite in this case would be used for the water table and ashlar below same and for front steps." See W. M. Poindexter and J.A. Henry Flemer, "Specifications for Labor and Materials for the Erection and Completion of a Building at the Washington Monument at Washington, D.C.," 18 February 1888, Box 3, Contracts, Entry 512, Records of the Engineer in Charge, 1876-1892, Record Group 42, Records of the Joint Commission for the Completion of the Washington Monument, 1876-1892, National Archives and Records Administration, Washington. From the construction reports of the Monument Lodge, it appears that at least some 'U.S. stone as was in the vicinity" was utilized in construction of the Monument Lodge. See John M. Wilson, Col. U.S. Army Corps of Engineers to Lane and Malnati, 23 May 1888, vol. 5, p. 23, Letters Sent, Entry 495, Records of the Engineer in Charge, 1876-1892, Records of the Joint Commission for the Completion of the Washington Monument, 1876-1892, Record Group 42, National Archives and Records Administration, Washington.
[102] Bernard R. Green, Asst. Engineer, to Brig. Genl. James Duane, 8 September 1887, vol. 4, p. 409-410, Letters Sent, Entry 495, Records of the Engineer in Charge, 1876-1892, Records of the Joint Commission for the Completion of the Washington Monument, 1876-1892, Record Group 42, National Archives and Records Administration, Washington.
[103] Col. John M. Wilson, U.S. Army Corps of Engineers, Engineer in Charge, to Geo. W. Thomas, Clerk and Supt. at the Washington Monument, 23 April 1888, vol. 5, entry 4424, Letters Sent, Entry 495, Records of the Engineer in Charge, 1876-1892, Records of the Joint Commission for the Completion of the Washington Monument, 1876-1892, Record Group 42, National Archives and Records Administration, Washington.
[104] John M. Wilson, Col. U.S. A., to Lane and Malnati, memorandum, 8 May 1888, Box 1, Schedule and letters Received Relating to Building Materials for the Completion of the Monument and Lodge and to the Disposition of Memorial Stones Note Placed in the Monument, Entry 530, Records of the Engineer in Charge, 1876-1892, Records of the Joint Commission for the Completion of the Washington Monument, 1876-1892, Record Group 42, National Archives and Records Administration, Washington.
[105] John M. Wilson, Col. U.S.A., Engineer in Charge, to Brig. Gen. J.C. Duane, Chief of Engineers, Chairman of Building Committee, 15 May 1888, Box 3, Letters Received, Entry 484, Records of the Joint Commission for the Completion of the Washington Monument, 1876-1892, Record Group 42, National Archives and Records Administration, Washington.
[106] G.M. Thomas to Col. John M. Wilson, U.S.A., 22 January 1889, Box 1, Schedule and letters Received Relating to Building Materials for the Completion of the Monument and Lodge and to the Disposition of Memorial Stones Note Placed in the Monument, Entry 530, Records of the Engineer in Charge, 1876-1892, Records of the Joint Commission for the Completion of the Washington Monument, 1876-1892, Record Group 42, National Archives and Records Administration, Washington.
[107] In 1875-76, 961 evergreen, maple, elm, and other varieties of trees "suited to the grounds" were planted. See U.S. Army Corps of Engineers, *Annual Report*, 1876. Roughly 781,274 deciduous and evergreen trees and shrubs were planted on the grounds in 1877. See U.S. Army Corps of Engineers, *Annual Report*, 1878.
[108] Hay was produced within both the monument and Smithsonian grounds that was used to feed animals belonging to the Corps of Engineers. See U.S. Army Corps of Engineers, *Annual Report*, 1883, 1885, 1886.
[109] U.S. Army Corps of Engineers, *Annual Report*, 1880-1884, 1886, 1887.

[110] Lt. Col. John M. Wilson, *Annual Report upon the Improvement and Care of Public Buildings and Grounds in the District of Columbia, Appendix ZZ of Annual Report of Chief of Engineers for 1888* (Washington: Government Printing Office, 1888), 2,594.
[111] Lt. Col. John M. Wilson, *Annual Report Upon the Improvement and Care of Public Buildings and Grounds and Care and Completion of the Washington Monument, in the District of Columbia, Appendix AAA of the Annual Report of the Chief of Engineers for 1889* (Washington: Government Printing Office, 1889), 2,831. Granolithic pavement was made of an 8-inch bed of coarse material, laid in two layers, topped with a 3.5-inch layer of hydraulic cement concrete marked with slab or flag divisions. Four, 5/16-inch-square iron rods were laid into the concrete and packed with the granolithic mixture, a composition of Portland cement and broken granite with a square or "cubed" fracture, spread 1-½ -inches thick. To make the final surface slip-resistant, a coating of dry cement and sand was floated over the granolithic layer.
[112] G.M. Thomas, custodian, to Col. John M. Wilson, U.S.A., "Report of Operations upon the Washington Monument for the month of January, 1889," 31 January 1889, Copies of Letters Sent by the Custodian of the Monument, Entry 529, Records of the Engineer in Charge of the Monument, 1879-1929, Record Group 42, National Archives and Records Administration, Washington.
[113] U.S. Army Corps of Engineers, *Annual Report*, 1887. The grounds were also proposed as a site for the 1893 Columbian Exposition, although Chicago was ultimately chosen as the host for this exposition. See John W. Reps, *Monumental Washington: the Planning and Development of the Capital Center* (Princeton, NJ: Princeton University Press, 1967), 225.
[114] H. R. Doc. 49-57 (1887), at 2. During construction of the monument, Casey had noticed that the north side of the monument settled more often than the southern side. He suspected this was due to the presence of Babcock Lake 250 feet north of the monument's foundations. The bottom of this lake was only four feet lower than the base of the foundations. Casey ordered Babcock Lake filled to remove any potential danger to the monument's stability. The two lakes west of the monument remained.
[115] Wilson, *Annual Report, Washington Monument, 1889.*
[116] John F. Mount to Col. O.H. Ernst, Engineer in Charge of the Washington Monument, "Report relating to the Washington Monument for the month of December 1889," 2 January 1890, p. 135, Box 1, Copies of Letters Sent by the Custodian of the Monument, Entry 529, Records of the Engineer in Charge of the Monument, 1879-1929, Record Group 42, National Archives and Records Administration, Washington.
[117] Acting Commissioner, U.S. Commission of Fish and Fisheries, to Bernard Green, Assistant Engineer, 15 July 1877; NPS-NCR Collection.
[118] Lt. Col. John M. Wilson and Col. Oswald H. Ernst, *Annual Report Upon the Improvement and Care of Public Buildings and Grounds and Care and Completion of the Washington Monument, in the District of Columbia, Appendix BBB of the Annual Report of the Chief of Engineers for 1890* (Washington: Government Printing Office, 1890), 3,538; Col. Theo. A. Bingham, *Annual Report upon the Improvement and Care of Public Buildings and Grounds and Care and Maintenance of the Washington Monument, in the District of Columbia, Appendix DDD of Annual Report of the Chief of Engineers* (Washington: Government Printing Office, 1902), 2,734; Col. Oswald H. Ernst, *Annual Report Upon the Improvement and Care of Public Buildings and Grounds and Care and Completion of the Washington Monument, in the District of Columbia, Appendix EEE of the Annual Report of the Chief of Engineers for 1891* (Washington: Government Printing Office, 1891), 3,908; Ernst, *Appendix BBB of the Annual Report of the Chief of Engineers for 1892*, 3, 387; War Department, U.S. Army Corps of Engineers, *Annual Report*, 1893, 1894; Bingham, *Annual Report, Washington Monument* (1902), 2,734.
[119] Bingham, *Annual Report, Washington Monument*, 1902, 2,734.
[120] Ibid., 2,734; Col. Thomas W. Symons and Col. Theo. A. Bingham, *Annual Report upon the Improvement and Care of Public Buildings and Grounds an Care and Maintenance of the Washington Monument, in the District of Columbia, Appendix EEE of Annual Report of the Chief of Engineers* (Washington: Government Printing Office, 1903), 2,545; Capt. Charles S. Bromwell, *Annual Report upon the Improvement and Care of Public Buildings and Grounds an Care and Maintenance of the Washington Monument, in the District of Columbia, Appendix DDD of Annual Report of the Chief of Engineers* (Washington: Government Printing Office, 1905), 2,641; Col. Chas. S. Bromwell, *Report upon the Improvement and Care of Public Buildings and Grounds an Care and Maintenance of the Washington Monument, in the District of Columbia, Appendix HHH of Annual Report of the Chief of Engineers* (Washington: Government Printing Office, 1906), 2,325.

[121] "Monument Measured by its Little Brother," *Washington Post*, 25 May 1958. During the first phase of construction, architect Robert Mills had used the Jefferson Stone as a benchmark for the monument. The Jefferson Stone was removed during improvements to the grounds in August 1874, and when construction resumed, there was no benchmark to determine the settlement of the monument since its construction. A Jefferson Stone Monument was built on the site of the original Jefferson Stone in 1889, but it did not serve as a benchmark for the monument.
[122] Bromwell, *Annual Report, Washington Monument* (1905) 2,659.
[123] Cosby, *Annual Report, Washington Monument* (1912) 3,495.
[124] U.S. Army Corps of Engineers, *Annual Report*, 1893; Symons and Bingham, *Washington Monument, Annual Report* (1903).
[125] U.S. Army Corps of Engineers, *Annual Report*, 1895.
[126] Torres, *Corps of Engineers*, 101.
[127] Lucy G. Barber, *Marching on Washington: the Forging of an American Political Tradition* (Berkeley, CA: University of California Press, 2002), 8-9, 44-45, 52-53.
[128] Barthold, *L'Enfant-McMillan Plan*, 42.
[129] Olszewski, *History of the Mall*, 47.
[130] Barthold, *L'Enfant-McMillan Plan*, 43.
[131] *Improvement of the Washington Monument Grounds*, H. R. Doc. 72-528 (1934), at 4.
[132] Barthold, *L'Enfant-McMillan Plan*, 45.
[133] Shultz, *Washington Monument Grounds*, 13.
[134] U.S. Commission of Fine Arts, http://www.cfa.gov/ (accessed 28 March 28).
[135] *New York Times*, 16 January 1912, 12.
[136] Barthold, *L'Enfant-McMillan Plan*, 45.
[137] Ibid., 50.
[138] U.S. Army Corps of Engineers, *Annual Report*, 1901.
[139] U.S. Army Corps of Engineers, *Annual Report*, 1923.
[140] U.S. Grant, III, Director, OPB&PP, June 17, 1926, General Order No. 67, *General Orders 1925-1927, Public Buildings and Public Parks*.
[141] U.S. Army Corps of Engineers, *Annual Report*, 1904.
[142] Bromwell, *Washington Monument, Annual Report* (1905), 2,641.
[143] Bromwell, *Washington Monument, Annual Report* (1907), 2,325
[144] Col. Spencer Cosby, *Report upon the Improvement and Care of Public Buildings and Grounds an Care and Maintenance of the Washington Monument, and the Highway Bridge Across the Potomac River, Washington, District of Columbia, Appendix EEE of Annual Report of the Chief of Engineers* (Washington: Government Printing Office, 1908), 2,344-2,345.
[145] Cosby, *Washington Monument, Annual Report*, 1,910.
[146] Col. Spencer Cosby, *Report upon the Improvement and Care of Public Buildings and Grounds an Care and Maintenance of the Washington Monument, and the Highway Bridge Across the Potomac River, and Upon Erection of Monuments, Memorials, etc., Washington, District of Columbia, Appendix EEE of Annual Report of the Chief of Engineers* (Washington: Government Printing Office, 1912), 3,502.
[147] Col. Chas. S. Bromwell, *Report upon the Improvement and Care of Public Buildings and Grounds and Care and Maintenance of the Washington Monument, in the District of Columbia, Appendix GGG of Annual Report of the Chief of Engineers* (Washington: Government Printing Office, 1907), 2,409.
[148] Col. Spencer Cosby, *Report upon the Improvement and Care of Public Buildings and Grounds an Care and Maintenance of the Washington Monument, and the Highway Bridge Across the Potomac River, Washington, District of Columbia, Appendix FFF of Annual Report of the Chief of Engineers* (Washington: Government Printing Office, 1910), 2,672.
[149] NPS-NACC, *The NACC Cherry Tree Source Book, Draft* (Washington: unpublished report, 1996), 9.
[150] Shultz, *Washington Monument Grounds*, 11-12.
[151] *Monument Lodge Planting Plan*, 9 October 1931, Drawing #807_84077, NPS-NCR Collection.
[152] Col. Spencer Cosby, *Report upon the Improvement and Care of Public Buildings and Grounds an Care and Maintenance of the Washington Monument, and the Highway Bridge Across the Potomac River, Washington,*

District of Columbia, Appendix EEE of Annual Report of the Chief of Engineers (Washington: Government Printing Office, 1911), 2,979.
[153] Office of the Public Buildings and Public Parks (OPB&PP) of the National Capital, *Annual Report of the Supervisor of Recreation for the Year 1925*, p. 7, Entry 302, Records of the Director, 1900-1933, Records of the OPB&PP, 1900-1935, Record Group 42, National Archives and Records Administration, Washington, D.C.
[154] OPB&PP, *Annual Report, Recreation, 1925*, 4, 13.
[155] Ibid., 26.
[156] Ibid., 4, 15.
[157] Ibid., 4, 8, 15.
[158] Ibid., 21.
[159] Ibid., 15, 29.
[160] Ibid., 29.
[161] OPB&PP, *Annual Report of Director of Public Buildings and Public Parks* (Washington: Government Printing Office, 1927), 36.
[162] OPB&PP, *Annual Report of Director of Public Buildings and Public Parks* (Washington: Government Printing Office, 1930), 50-51.
[163] "Washington Monument to be Screen for Movie," *Eastern Star*, 15 April 1916. The parks included in this movie included Grand Canyon, Yellowstone, Yosemite, Crater Lake, Rocky Mountain, Mesa Verde, Mount Rainier, Sequoia, and General Grant. Barry Mackintosh, *The National Parks: Shaping the System* (Washington: National Park Service, 2000), web-only edition, http://www.cr.nps.gov/history/online_books/mackintosh1/index.htm (accessed April 16, 2003).
[164] OPB&PP, *Annual Report* (1927), 15.
[165] OPB&PP, *Annual Report, Recreation* (1925), 41; OPB&PP, *Annual Report* (1931), 50.
[166] OPB&PP, *Annual Report of Director of Public Buildings and Parks of the National Capital* (Washington: Government Printing Office, 1928), 29; OPB&PP, *Annual Report, Public Buildings and Parks* (1929), 42; OPB&PP, *Annual Report, Public Buildings and Parks* (1931), 57.
[167] OPB&PP, *Annual Report, Recreation, 1925*, 26, 28.
[168] OPB&PP, *Annual Report, Recreation, 1925*, 28. As the Grand Kleagle of the District of Columbia Klan, L.A. Mueller, began his remarks at the Sylvan Theatre, it began to rain. He pleaded with the crowd, "Don't leave. It will not rain. God won't let it rain. Please have the same faith in God that I have and don't leave. Stay and I promise you it won't rain." The Rev. Dr. A. H. Gulledge also prayed the rain would stop, "Oh, God, I pray that the remainder of this service will be conducted without rain." The rain continued to fall and the gathered crowd disappeared. See "Klansmen, Praying for Rain to Stop, Receive Drenching," *Washington Post*, 9 August 1925.
[169] OPB&PP, *Annual Report, Recreation, 1925*, 28.
[170] OPB&PP, *Annual Report* (1927), 41; OPB&PP, *Annual Report, Public Buildings and Parks* (1928), 33; OPB&PP, *Annual Report, Public Buildings and Parks* (1929), 42.
[171] "Unusual Tributes Paid Washington in Services Here," *Evening Star*, 23 February 1920, 1.
[172] The display of a ring of flags, one for each state, was a feature of the annual Washington birthday celebrations and by the 1940s the flags were flown during the 4th of July celebrations. See Michael D. Hoover, *Origins and History of the Washington Monument Flag Display* (National Park Service, unpublished report, 1992).
[173] Olszewski, *Washington Monument 1844-1968*, Illustration 2.
[174] OPB&PP, *Annual Report* (Washington: Government Printing Office, 1927).
[175] *Arizona State Memorial Stone Proceedings Held in the Washington Monument Washington, D.C., at the Dedication of a Memorial Stone Placed in the Monument by the State of Arizona*. S. Doc. 68-109 (1924), at 11-13.
[176] OPB&PP, *Annual Report, Public Buildings and Parks* (1932). These floodlights replaced an earlier, inadequate earlier single search light installed on the roof of the Navy Building (*Annual Report, OPB&PP*, 1929). Red aircraft warning lights had been installed in one window on each side of the pyramidion in March 1931. See OPB&PP, *Annual Report* (1931). The exterior of the monument had first been lit as a summertime attraction for guests of the Powhattan Hotel on Pennsylvania Avenue. See Olszewski, *Washington Monument*, 61.
[177] OPB&PP, *Annual Report, Public Buildings and Parks* (1932).
[178] House, "Improvement of the Washington Monument Grounds," 1934, 5-6.

[179] Ibid., 6. This Advisory Committee was composed of Frederick Law Olmsted, Jr., landscape architect, William A. Delano, architect, L. Vipond Davies, civil engineer, and foundation expert, Lazarus White, civil engineer and underpinning expert, Maj. D.H. Gillette, U.S. Army Corps of Engineers, and John. L. Nagle, designing engineer.
[180] OPB&PP, *Annual Report* (1931), 35. The first series of borings was taken in the fall of 1930 at the outer edge of the drive around the monument. In March 1931, the second set was taken further from the monument.
[181] *Improvement of the Washington Monument Grounds*, H.R. Doc. 72-528 (1934), at 12.
[182] Ibid., 12-14.
[183] Ibid., 21.
[184] Ibid., 24.
[185] Ibid., 35.
[186] Ibid., 42.
[187] "Sidewalk Construction and Roadway Revisions, Monument Grounds," 23 March 1936, Drawing 807_84157 p. 1; NPS-NCR Collection.
[188] Mackintosh, *Shaping the System*.
[189] "Proposed Chlorinating Plant for Condensing Water Tunnel," 2 September 1939, Drawing 74-21-9; Record Group 70, Cartographic and Architectural Records, National Archives and Records Administration, College Park, MD. It is unclear how much of this plan was implemented. It appears a chlorination plant was constructed at or near the Survey Lodge in May 1940 (Heman S. Ward to Superintendent, National Park Service; May 13, 1940; NPS-NCR Collection). Some of the alterations shown on the plans for the chlorination plant, such as the areaway and stair to the basement, were present by the 1980s, while others, such as the vehicular entry on the ground floor, appear never to have been installed. The *1973 Washington Monument Visitor Facility Comprehensive Design Program* recommended the retention of the Survey Lodge's use for office space and the removal of the chlorination tanks. Hartman-Cox Architects, *Visitor Facility for the Washington Monument, Washington D.C. Comprehensive Design Program and Engineering Feasibility Design Program* (Washington: National Park Service, September 20, 1973). This is the only written documentation found during research for this CLR that addresses the installation of chlorination tanks at the Survey Lodge.
[190] National Park Service, Eastern Division, Branch of Washington, 21 January 1935, Box 1, Correspondence, Entry 432, Records of the Secretary, 1833-1951, Records of the Washington National Monument Society, 1833-1951, Record Group 42, National Archives and Records Administration, Washington.
[191] E.K. Burlow, Administrative Assistant and Budget Officer to Arno B. Camerer, director, NPS, January 15, 1936; NPS-NCR Collection.
[192] Gerald Gross, "Board Starts to Demolish Pools Today," *Washington Post*, 15 March 1935; "Municipal Pools Near Monument Remain for a Time," *Evening Star*, 15 March 1935.
[193] G.T. Mayfield to Mr. Gartside, memorandum, 12 July 1937; NPS-NCR Collection.
[194] OPB&PP, *Annual Report* (1931).
[195] Harry T. Thompson, National Capital Parks, NPS, to Superintendent, NCP, NPS, Memorandum, 9 October 1942, NPS-NCR Collection.
[196] Barthold, *National Mall*, 22. These roads were renamed Washington, Adams, Jefferson, and Madison in the 1960s. See Olszewski, *History of the Mall*, 95.
[197] Shultz, *Washington Monument Grounds*, 14.
[198] Ibid., 16-17.
[199] Newton B. Drury, *U.S. Department of the Interior Annual Report of the Director of the National Park Service to the Secretary of the Interior* (Washington: Government Printing Office, 1942), 162.
[200] Irving C. Root, Supervisor, to W.E. Reynolds, Commissioner Public Buildings Administration, 28 April 1942, NPS-NCR Collection.
[201] "Temp. Fed. Office Bldgs T3, T4, & T5," 2 February 1942; Drawing #807_84200, NPS–NCR Collection.
[202] "Approach Plan – Tentative," 12 July 1943, Drawings #807_84215; "Approach Plan," 20 July 1943, Drawing #807_84215a, NPS-NCR Collection; Irving C. Root, Supervisor, NCR, to W.E. Reynolds, Commissioner, Public Buildings Administration, 22 February 1945; NPS-NCR Collection.
[203] "Proposed Improvements, Sylvan Theatre," 8 March 1944, Drawing #807_84223; NPS-NCR Collection.
[204] Phanz, "Washington Monument," item 7, page 2.
[205] "Concession Stand, Monument Grounds," 12 January 1948, Drawings 74.20-38-1, Record Group 79, Cartographic and Architectural Records, National Archives and Records Administration, College Park, MD.

[206] "Aluminum Awning, Sink & Lav., Concession Stand, Washington Monument Lodge," 25 November , 1952; Drawing 807_80067; NPS-NCR Collection.
[207] Phanz, "Washington Monument," item 7, page 3.
[208] Wunsch, *Washington Monument*, 15.
[209] Ibid., 6.
[210] Ibid., 7.
[211] Brian Moor, "Washington Monument to Undergo $5 Million Face Lift," *Washington Post*, 4 July 1997, B1.
[212] Gabriel Escobar, "One Last Party Before Monument Goes Under Wraps," *Washington Post*, 3 July 1998, A1.
[213] Hoover, *Flag Display*, 3.
[214] "Flagpole Arrangement, Washington Monument," 8 January 1957, Drawing #807_84279; NPS-NCR Collection.
[215] Hoover, *Flag Display*, 4-5.
[216] Ibid., 1.
[217] Presidential Proclamation, "Display of Flags at the Washington Monument, Proclamation 4064" *Federal Register* 36, 10 July 1971, 133.
[218] "Cherry Tree Planting, Sylvan Theatre, Monument Grounds," 7 June 1954, Drawing 807_84272A, NPS-NCR Collection.
[219] "Preliminary Cherry Tree Planting Scheme 2," Skidmore, Owings and Merrill, 26 October 1966, Drawing 807_84368B, NPS-NCR Collection.
[220] Barthold, *L'Enfant-McMillan Plan*, 72.
[221] "Kiosk locations, H Street – N of Washington Monument Lodge," March 17, 1966, Drawing 807_84374; NPS-NCR Collection.
[222] National Park Service, *Environmental Impact Assessment, Interim Development Plan for Washington Monument Grounds, Washington, D.C.*, unpublished report, May 1974.
[223] Commemorating the 300 years since the founding of Germantown, Pennsylvania, the first German settlement in North America; Charles Z. Wick, United States Information Agency, to Donald P. Hodel, Secretary of the Interior, 17 April 1984; Robert Stanton, Acting Regional Director, National Capital Region, to Carol B. Thompson, State Historic Preservation Officer, Department of Consumer and Regulatory Affairs, 7 July 1986; NPS-NCR Collection.
[224] Thomas M. McConnell, Assistant Chief, Division of Contracting, DOI, NPS, NCR to Roger Gosalia, Vice President, MTI Construction Co., Inc., 27 June 1988; NPS-NCR Collection.
[225] John S. Haney, "Relighting the Washington Monument" in *Illuminating Engineering* (August 1958): 433-436.
[226] Olszewski, *History of the Mall*, 98-99. Vehicular traffic was prohibited from Washington and Adams Drives, the two inner Mall drives, in the 1970s. Barthold, *National Mall*, 25; "Separate Entrance, Exit and Plaza Planned for Remodeled Monument," *Washington Post*, 20 January 1959.
[227] "Washington Monument Improvements Planned," *The Evening Star*, 23 February 1956.
[228] National Park Service, *Outline of Future Plans for Improvements in the Vicinity of the Washington Monument Under the National Park Service MISSION 66 Program* (Washington: Department of the Interior, 1959).
[229] Hartman-Cox Architects, *Visitor Facility for the Washington Monument*.
[230] National Park Service, *Environmental Impact Assessment, Interim Development Plan for Washington Monument Grounds*, unpublished report, May 1974.
[231] National Park Service, *Development Concept Plan: Washington Monument Grounds (Revisions to the 1981 Development Concept Plan)* (Washington: Department of the Interior, April 1989), 7.
[232] National Park Service, *Development Concept Plan*, 4.
[233] National Park Service, *Development Concept Plan*, 1-2.
[234] J. Carter Brown to Manus J. Fish, 30 September 1981, NPS-NCR Collection.
[235] Report of the Secretary, Washington National Monument Society, Calendar Year 1986.
[236] National Park Service, *Development Concept Plan*, 5, 8.
[237] National Park Service, *Process of Implementation for Grounds Improvement and Accessibility, Washington Monument Grounds*, (Washington: Department of the Interior, May 1993).
[238] *Evening Star*, 5 July 1944.

[239] *Evening Star*, 31 July 1944. The acronym stands for "Women Accepted for Volunteer Emergency Service." See Judy Barrett Litoff, and David C. Smith, *We're In This War Too: World War II Letters from American Women in Uniform* (New York: Oxford University Press, 1994).
[240] *Evening Star*, 5 October 1945.
[241] National Capital Parks – Central, *Washington National Monument, Annual Report, 1969* (Washington: National Park Service, 1970).
[242] "Monument Rites Attract 200,000," no source given, 5 July 1948.
[243] *Washington Post and Times Herald*, 29 December 1949; *Washington Post*, 19 March 1963; *Washington Post*, 19 June 1963.
[244] National Park Service, *Washington National Monument–Annual Report*. unpublished report, 1961.
[245] Barber, *Marching on Washington*, 149-151, 157. Earlier civil rights activities had also used a location away from the traditional seats of power. Marian Anderson's 1939 Easter Sunday concert was held at the Lincoln Memorial which helped to link this site to the civil rights movement. The planned, but not carried out, Negro March on Washington was to end at the Lincoln Memorial after traveling along Pennsylvania Avenue past the White House. Barber, *Marching on Washington*, 124.
[246] National Capital Parks–Central, *Washington National Monument, Annual Report, 1969* (Washington: National Park Service, 1970).
[247] Barber, *Marching on Washington*, 198-204.
[248] Courtland Milloy and Tom Sherwood, "Monument is Hostage 10 Hours," *Washington Post*, 9 December 1982, A1.
[249] Matt Neufield, "The Monument takes lick from 18-wheeler," *The Washington Times*, 21 November 1985.
[250] Barber, *Marching on Washington*, 223.
[251] Wheeler, "Security on the Mall," *Washington Post*, A1, 12.
[252] "The Washington Monument Grounds," *NCPC Quarterly* (Summer 2001): 6.
[253] Benjamin Forgey, "Quick Fix Breaks the Monumental Mood," *Washington Post*, 14 August 2001, C1-2.
[254] National Capital Planning Commission, "Commission Action: Washington Monument Grounds, Revised Development Concept Plan and Preliminary Site and Building Plans for Visitor and Security Improvements," 9 January 2003, 5.
[255] National Capital Planning Commission, *Design Concept (Visitor and Security Improvements) Washington Monument Grounds Washington, D.C., Report to the National Park Service*, 7 February 2002, NCPC File No. 1303/6152.
[256] National Park Service, *Decision Notice and Finding of No Significant Impact, Washington Monument Permanent Security Improvements Environmental Assessment*, unpublished report, July 2002.

SITE HISTORY

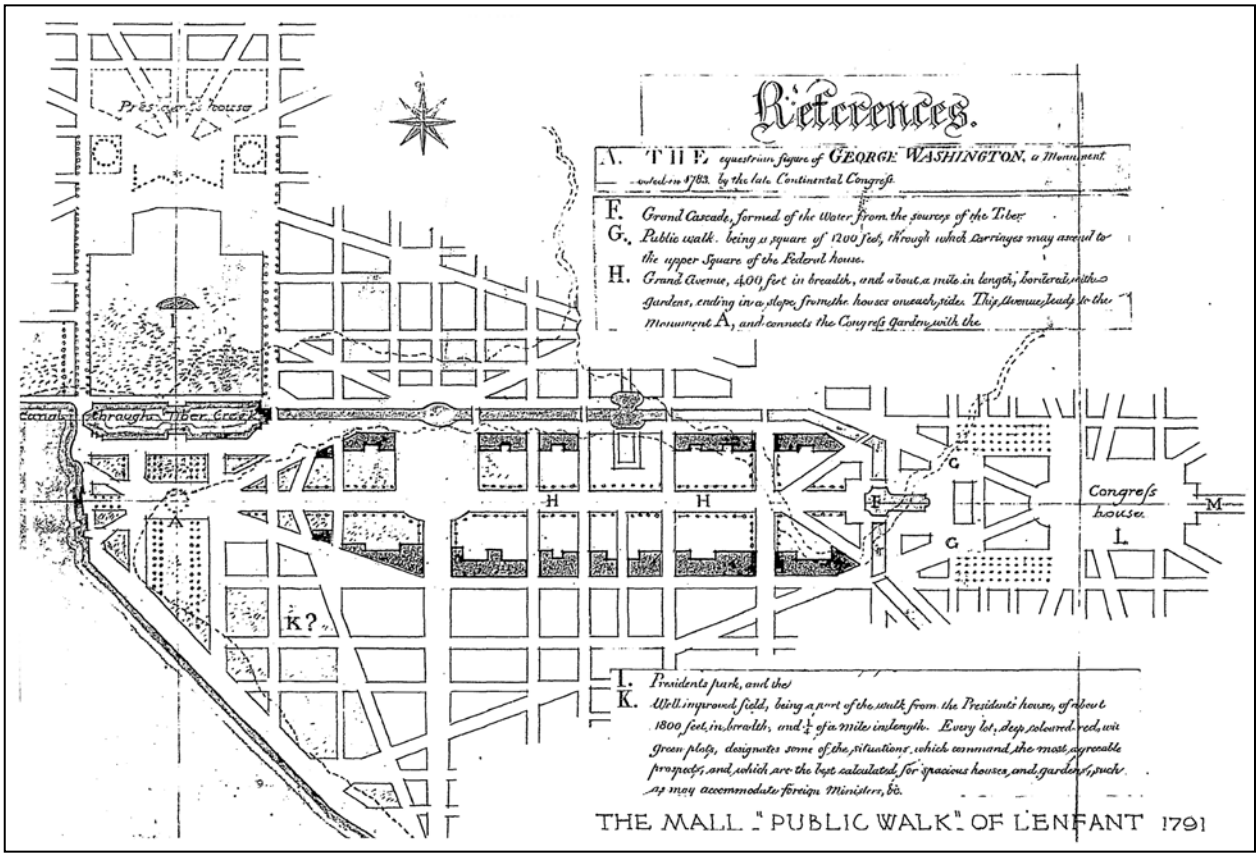


Figure 2-1. L'Enfant's 1791 Plan for the Mall.

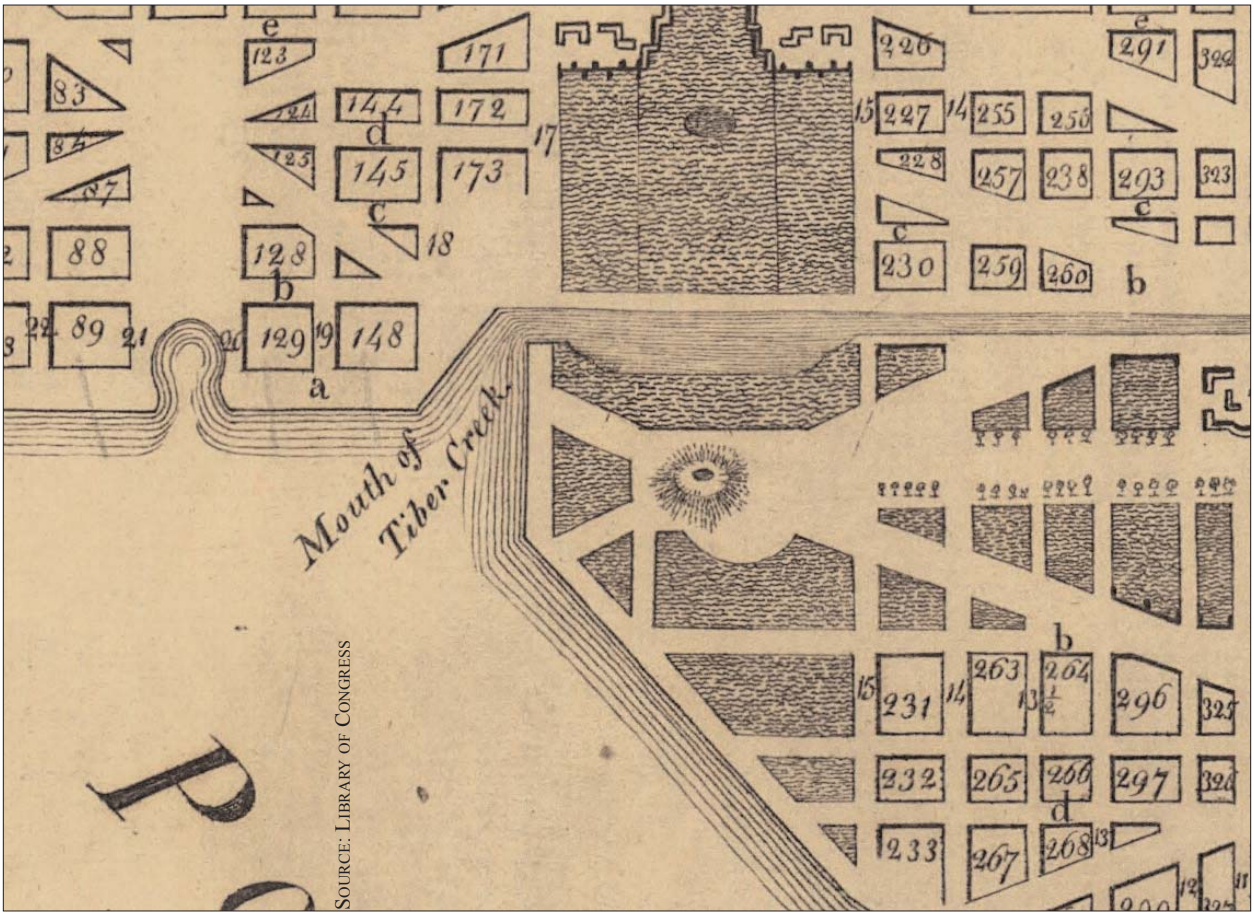


Figure 2-2. Andrew Ellicott's Plan, ca. 1792, detail. Ellicott's plan was based on L'Enfant's. This detail shows the proposed site for a monument to honor Washington.

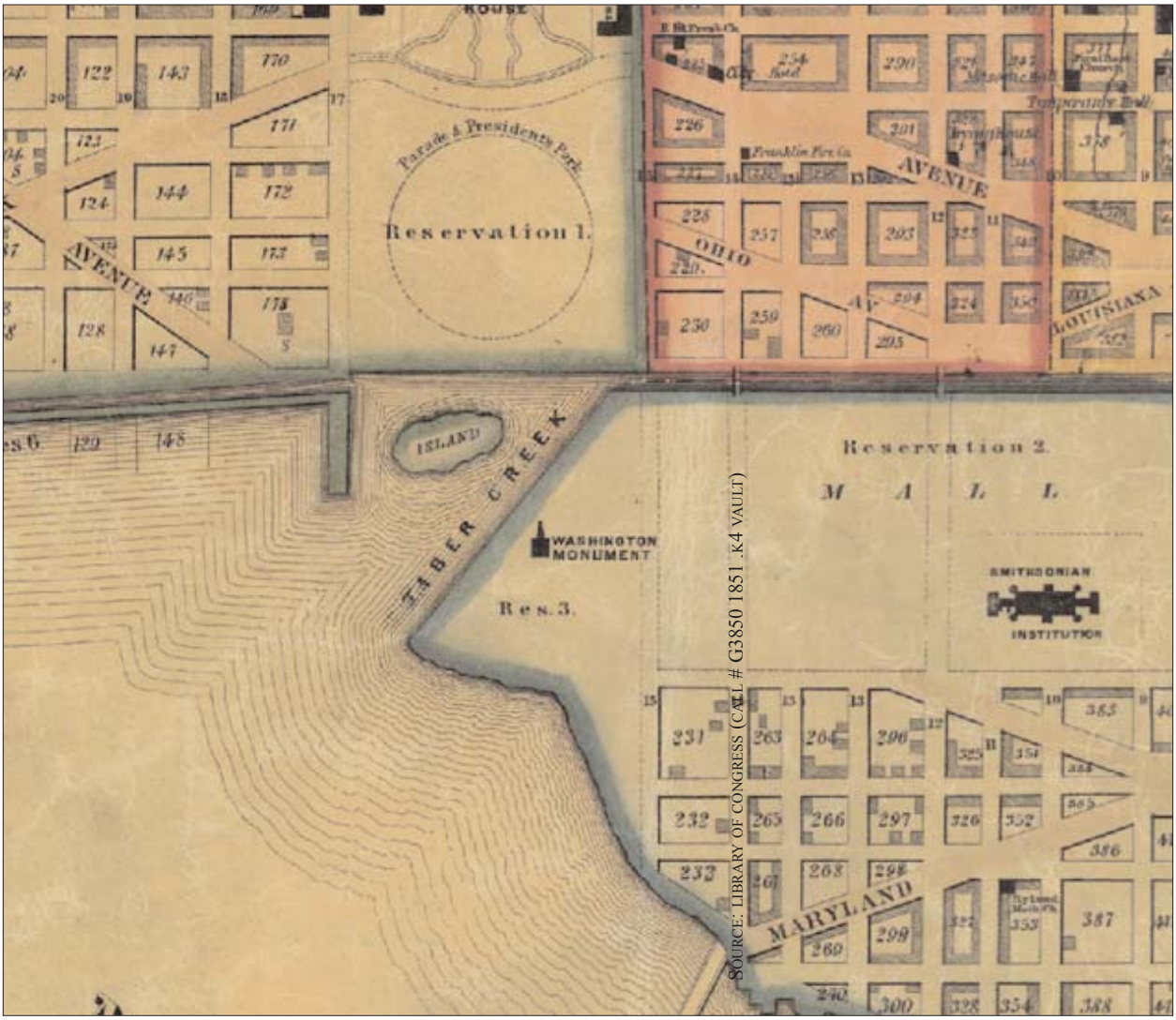
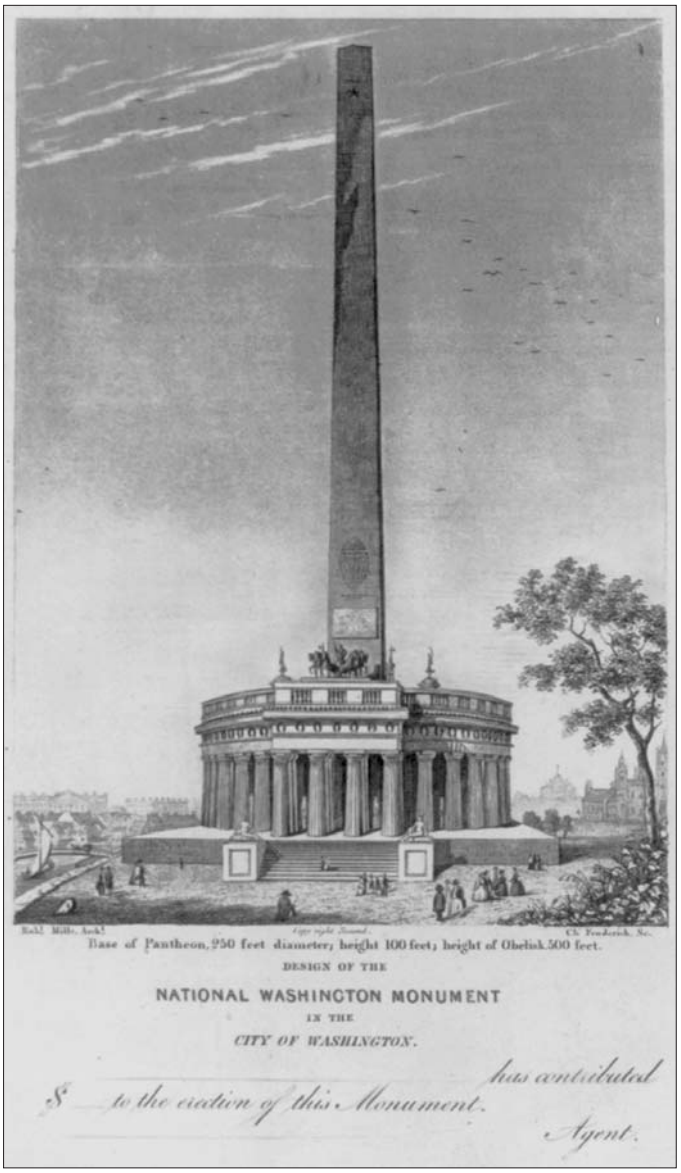


Figure 2-3. James Keily's 1851 survey map showing Washington Monument area.



SOURCE: LIBRARY OF CONGRESS, LC-USZ62-58546

Figure 2-4. 1846 engraving of Robert Mills' design for a monument to George Washington.

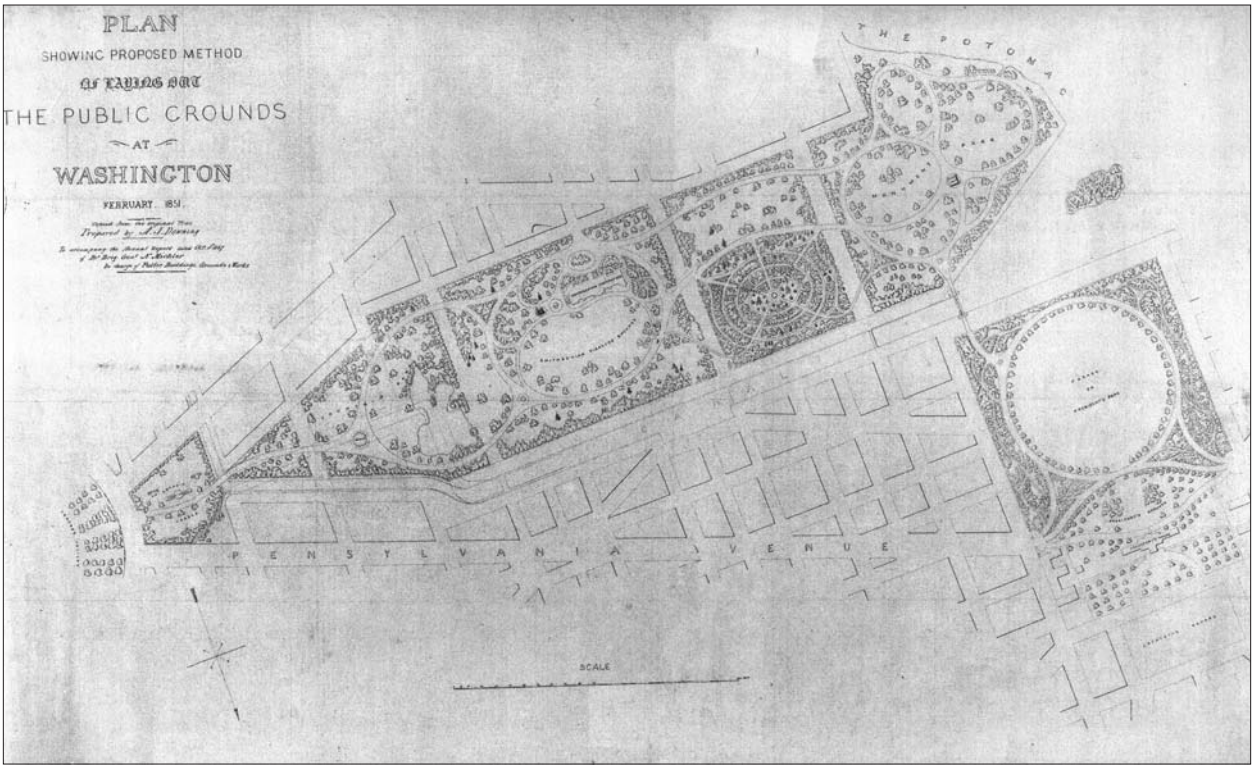
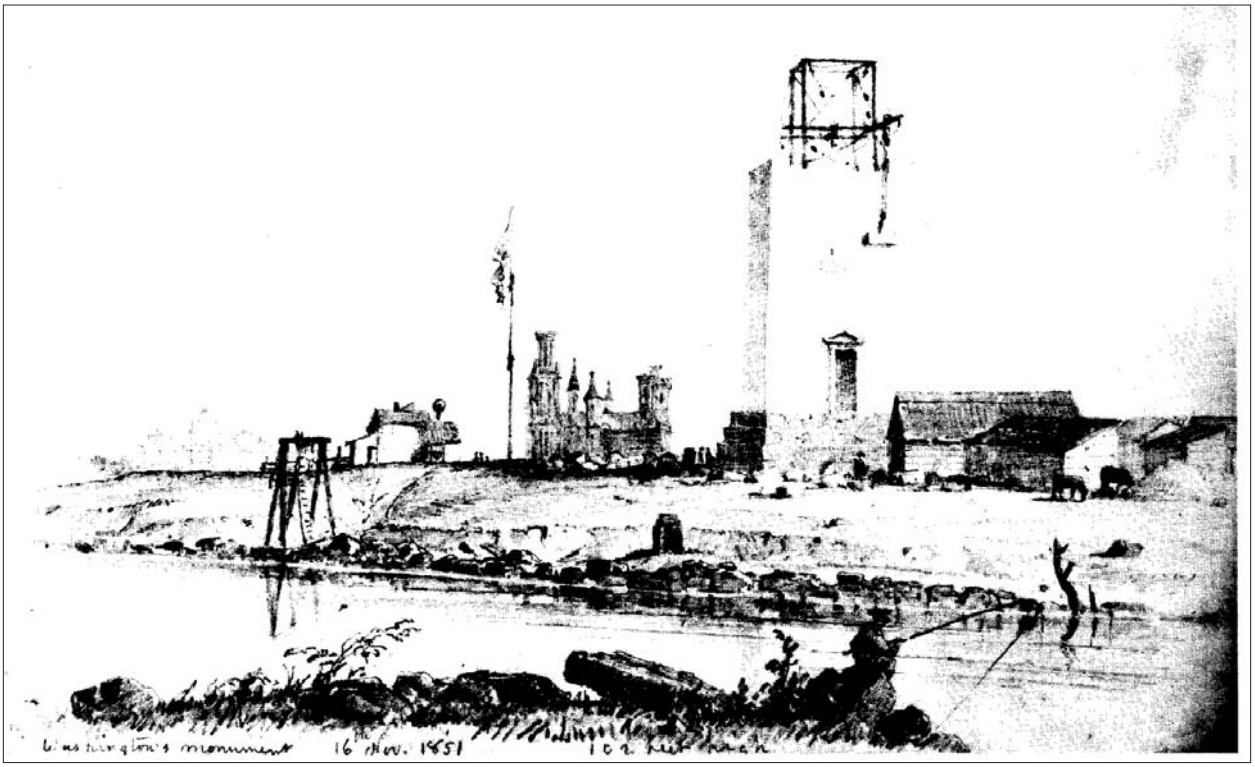


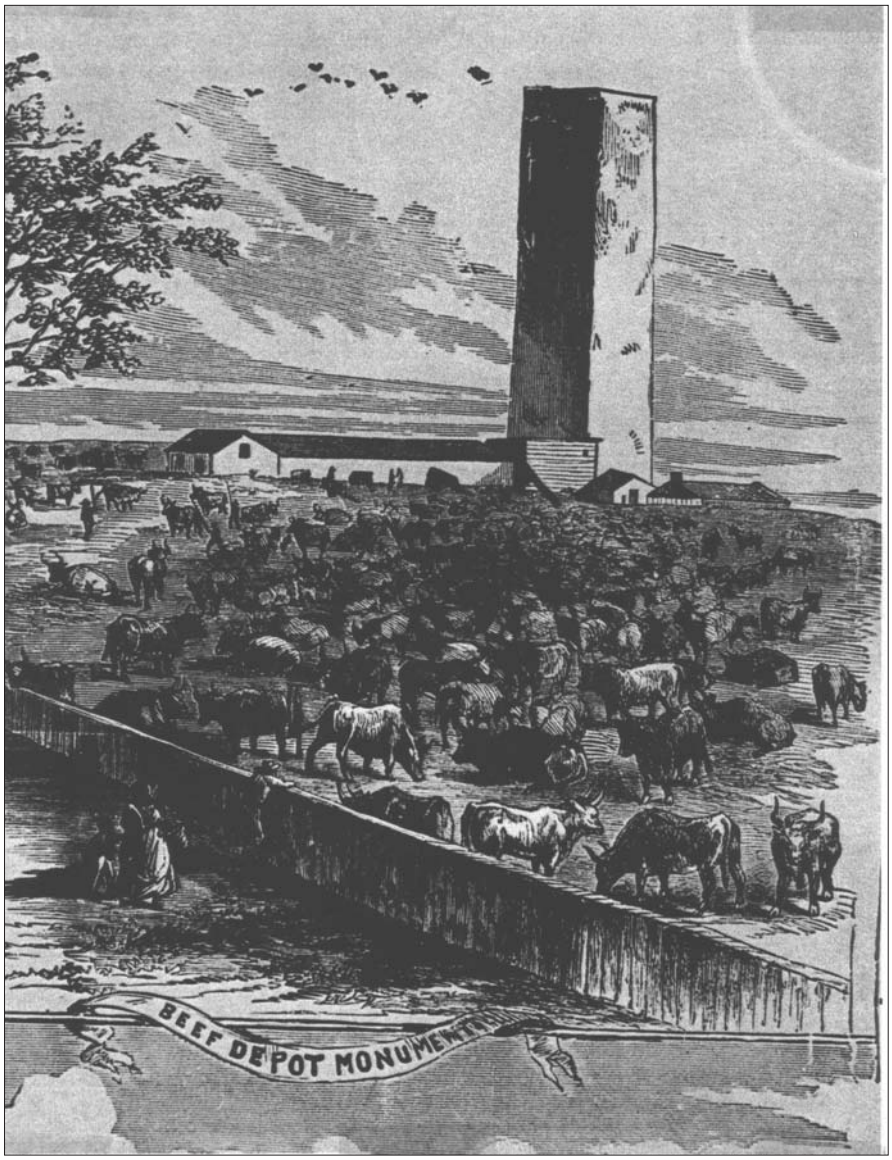
Figure 2-5. 1867 redrawing of Andrew Jackson Downing's 1851 plan for the Mall.

SOURCE: JOHN W. REPS, MONUMENTAL WASHINGTON, THE PLANNING AND DEVELOPMENT OF THE CAPITAL CENTER (PRINCETON, N.J.: PRINCETON UNIVERSITY PRESS, 1967), 127



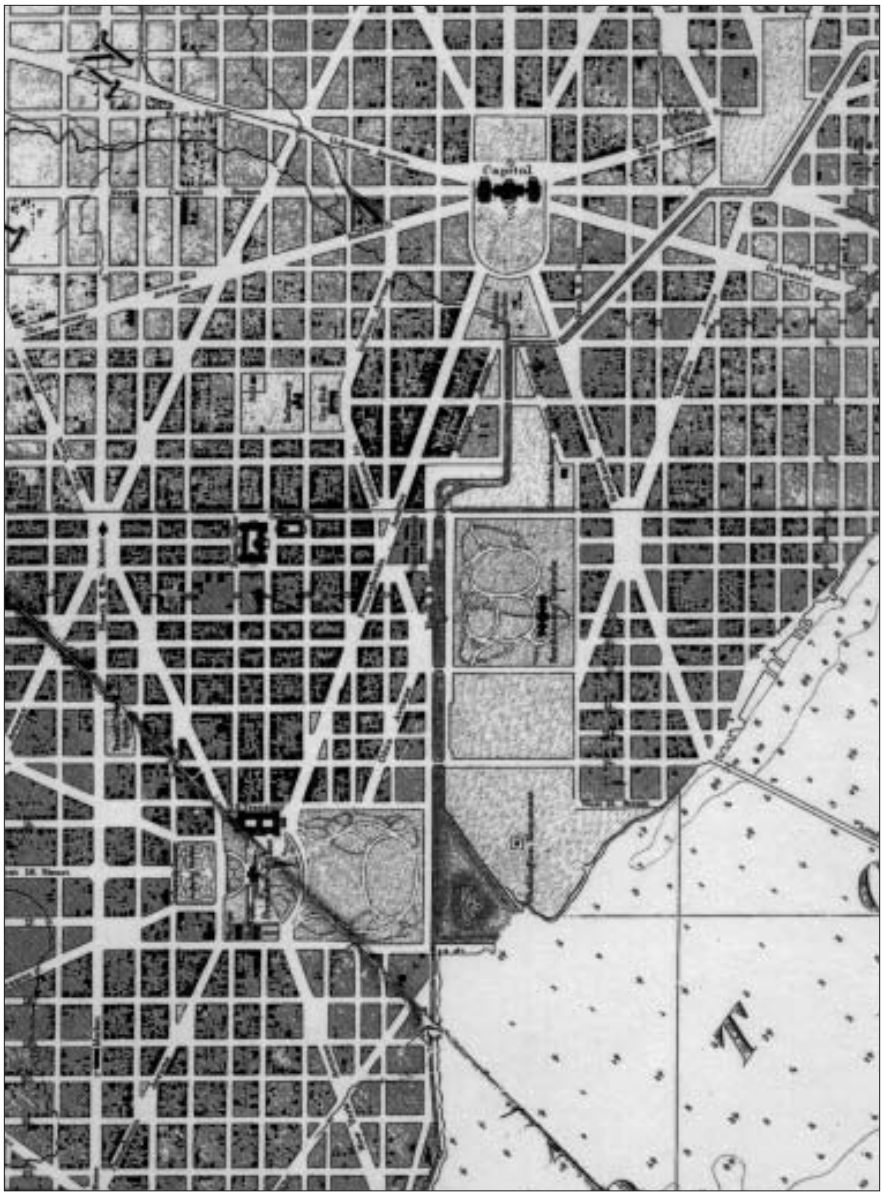
SOURCE: LONGSTRETH, ED. MALL IN WASHINGTON, 195, PLATE XL

Figure 2-6. 1851 watercolor of the Washington Monument, by Seth Eastman.
Note the various wooden construction buildings around the base of the monument and the Jef ferson Pier in the foreground on the bank of the Tiber Creek.



SOURCE: HISTORICAL SOCIETY OF WASHINGTON, D.C., 1882

Figure 2-7. 1862 engraving of "Beef Depot Monument."



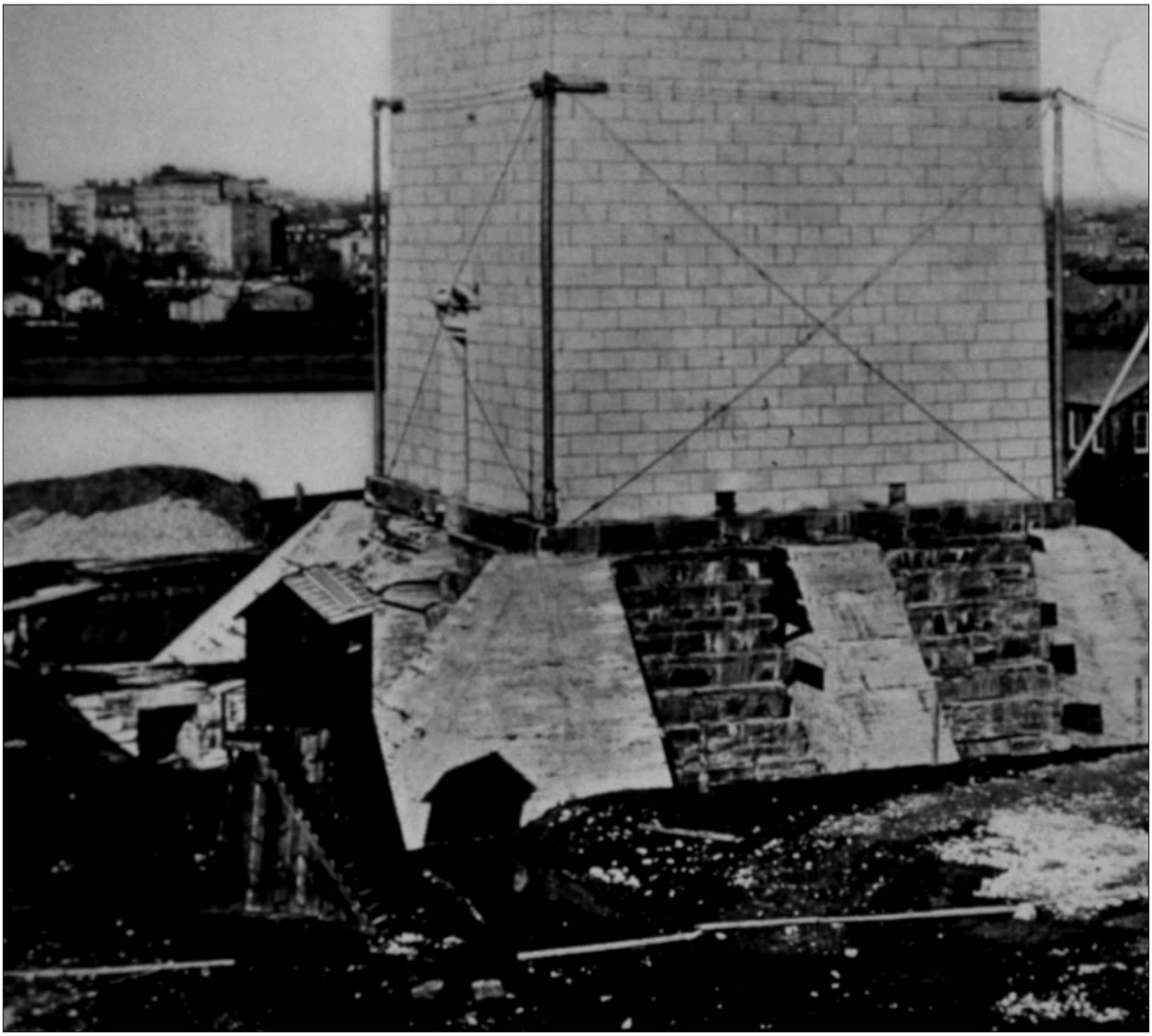
SOURCE: REPS, 139

Figure 2-8. 1861 engraving of Boschke's topographical map.



SOURCE: LIBRARY OF CONGRESS, 1879

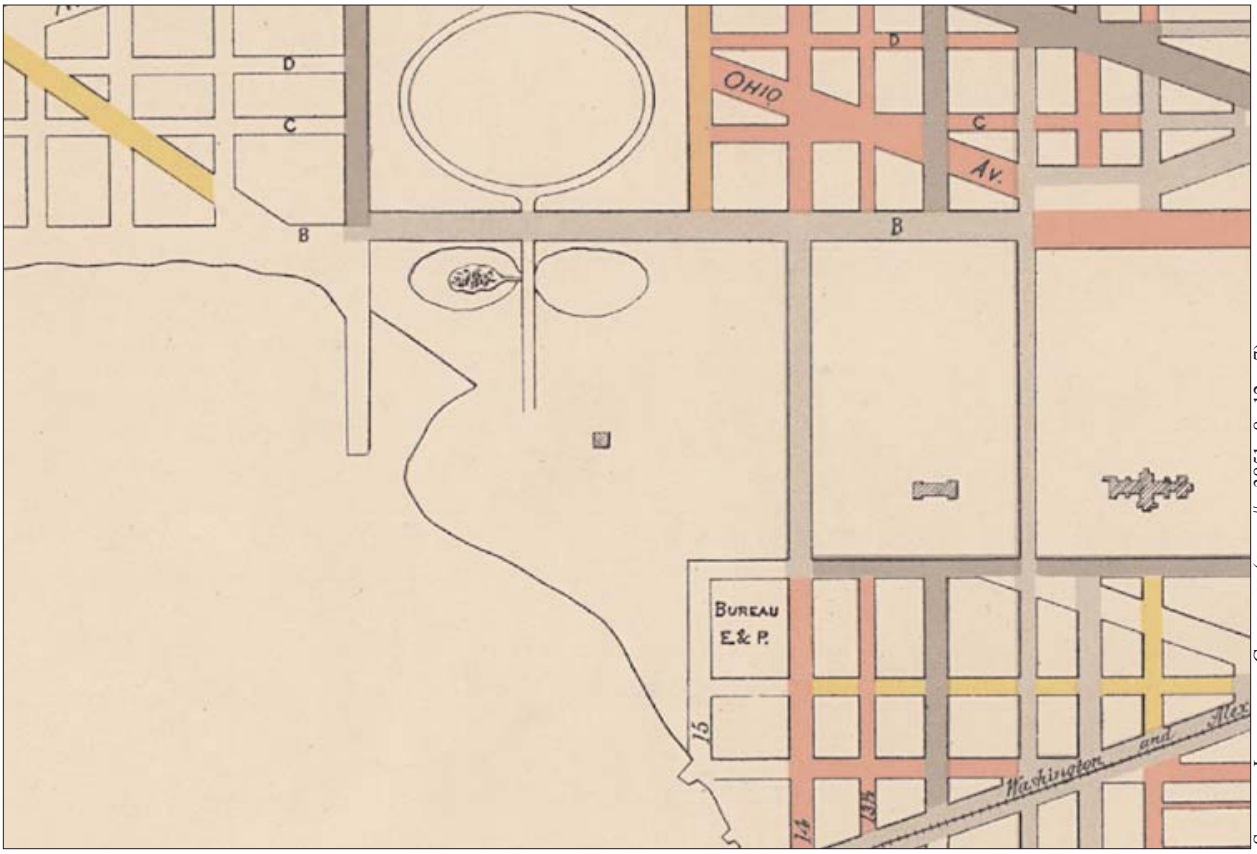
Figure 2-9. photograph of the monument and grounds, ca. 1875. Note the Department of Agriculture grounds in the foreground. Note Babcock Lake to the north (right) of the monument and the Tiber Creek and nearby Potomac River behind the monument.



SOURCE: LIBRARY OF CONGRESS, (CALL #LC-USZ62-15296)

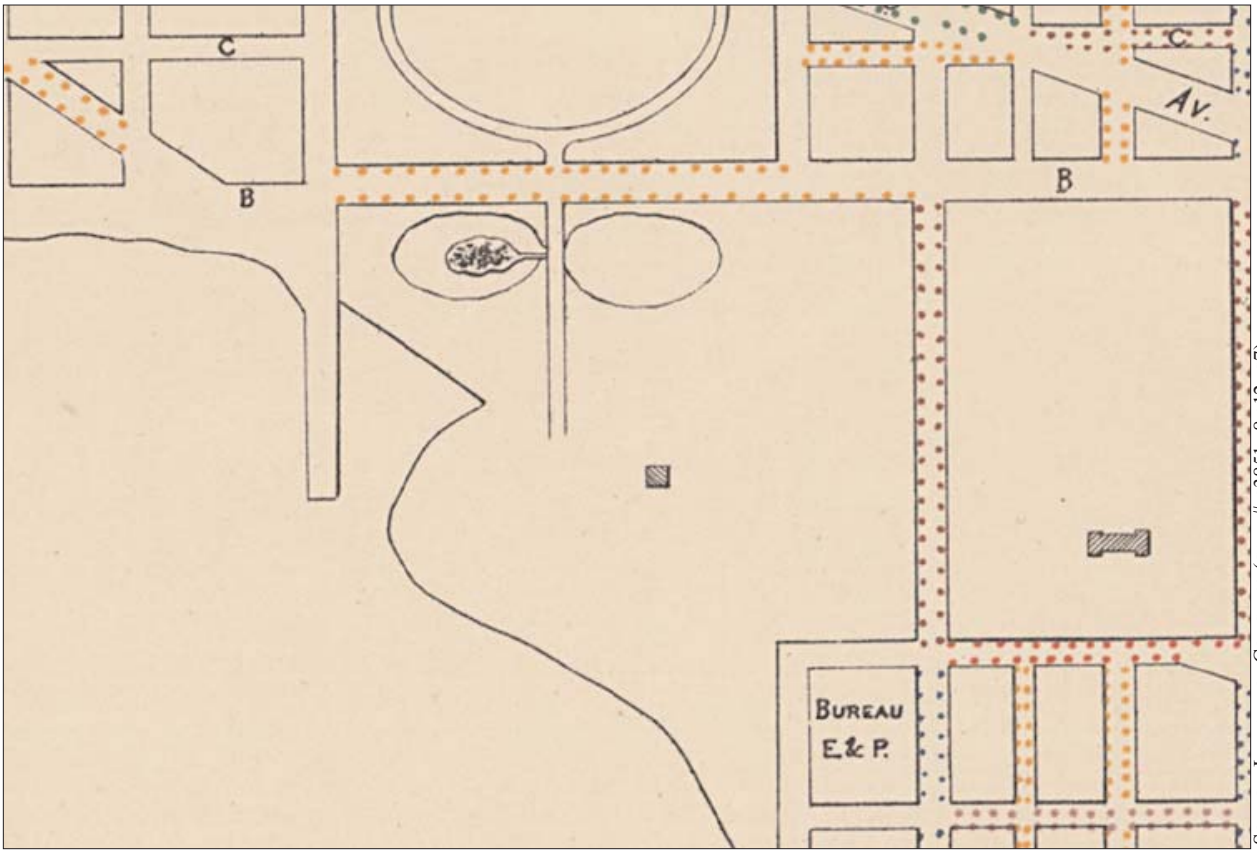
Figure 2-10. 1880 photograph of monument foundation reinforcement.

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SOURCE: LIBRARY OF CONGRESS (CALL # G3851.F8 S12 .G7)

Figure 2-11. 1880 statistical map showing street paving types, detail.
From "City of Washington, Statistical Maps," compiled by civil engineer Lieut. F.V. Greene to accompany the report to the Commissioners of the District of Columbia for the year.



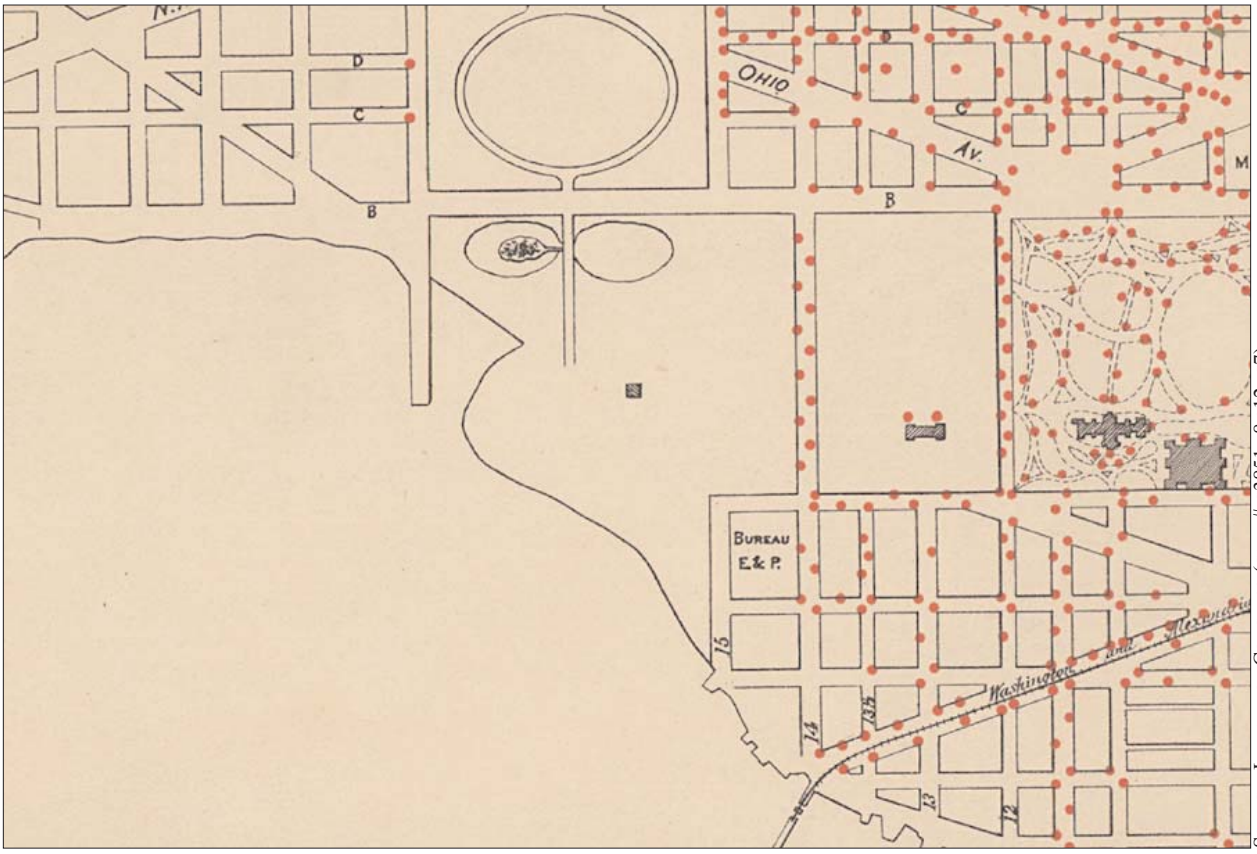
SOURCE: LIBRARY OF CONGRESS (CALL # G3851.F8 S12 .G7)

Figure 2-12. Detail of a map showing existing street tree species, 1880.
From "City of Washington, Statistical Maps," compiled by civil engineer Lieut. F.V. Greene to accompany the report of the Commissioners of the District of Columbia for the year.



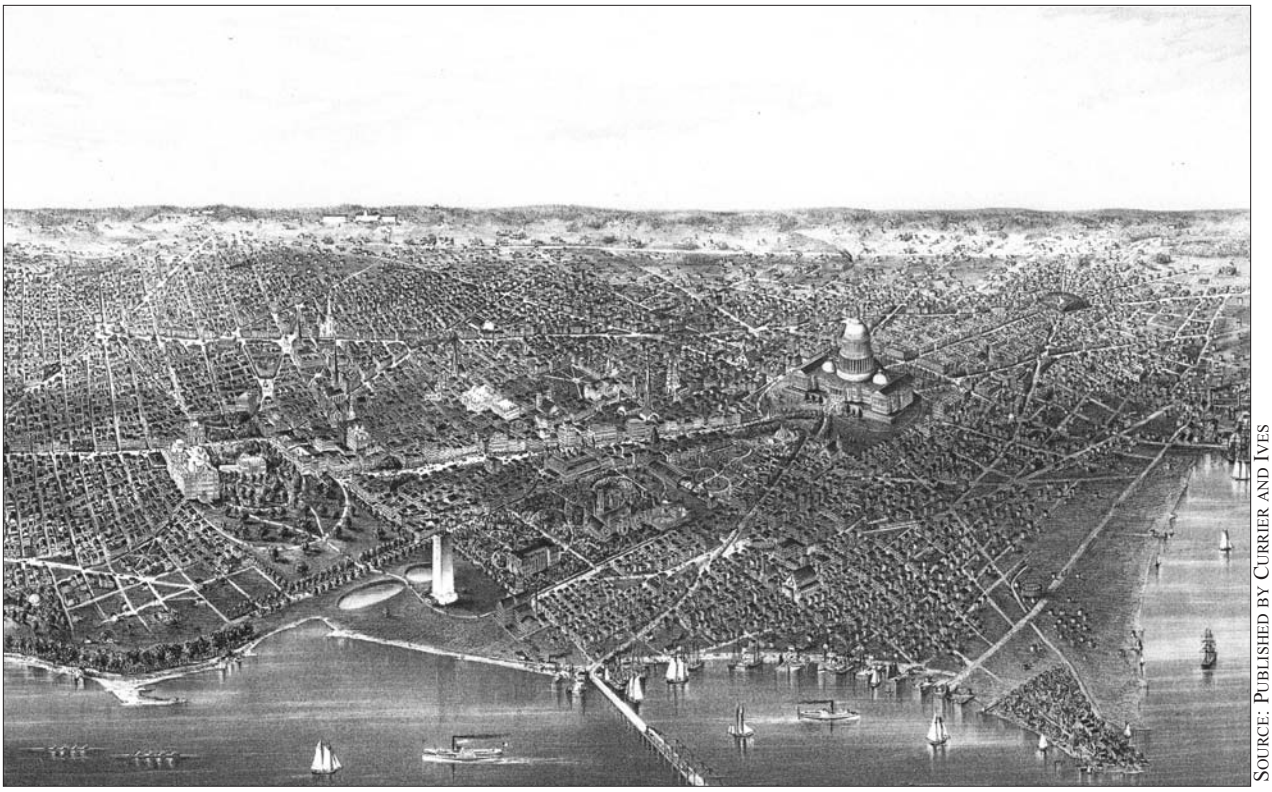
SOURCE: LIBRARY OF CONGRESS (CALL # G3851.F8 S12 .G7)

Figure 2-13. 1880 statistical map showing street grades and topography, detail.
From "City of Washington, Statistical Maps," compiled by civil engineer Lieut. F.V. Greene to accompany the report of theCommissioners of the District of Columbia for the year.



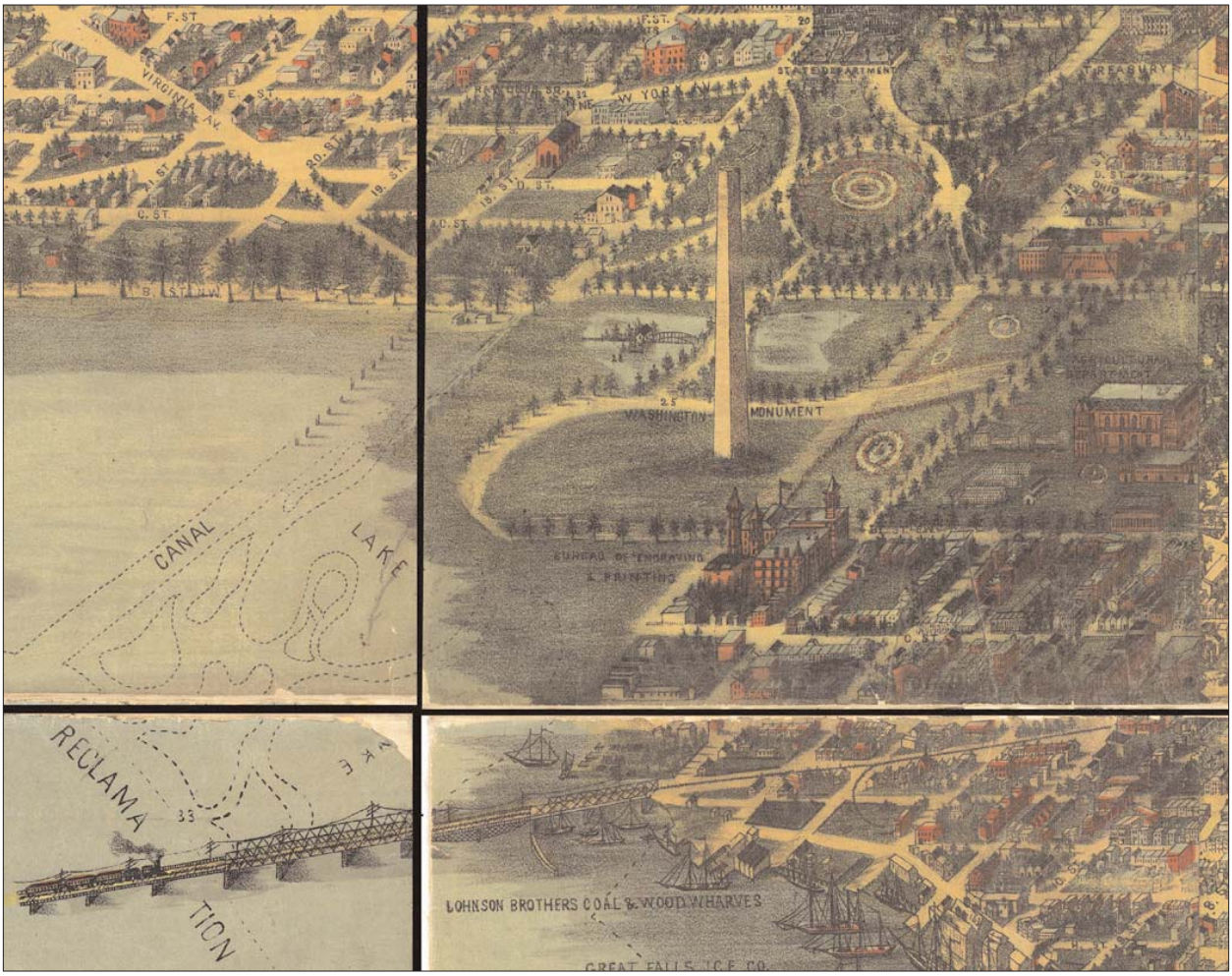
SOURCE: LIBRARY OF CONGRESS (CALL # G3851.F8 S12 .G7)

Figure 2-14. 1880 statistical map showing existing gas lamps, detail.
Maps," compiled by civil engineer Lieut. F.V. Greene to accompany the report of the
Commissioners of the District of Columbia for the year.



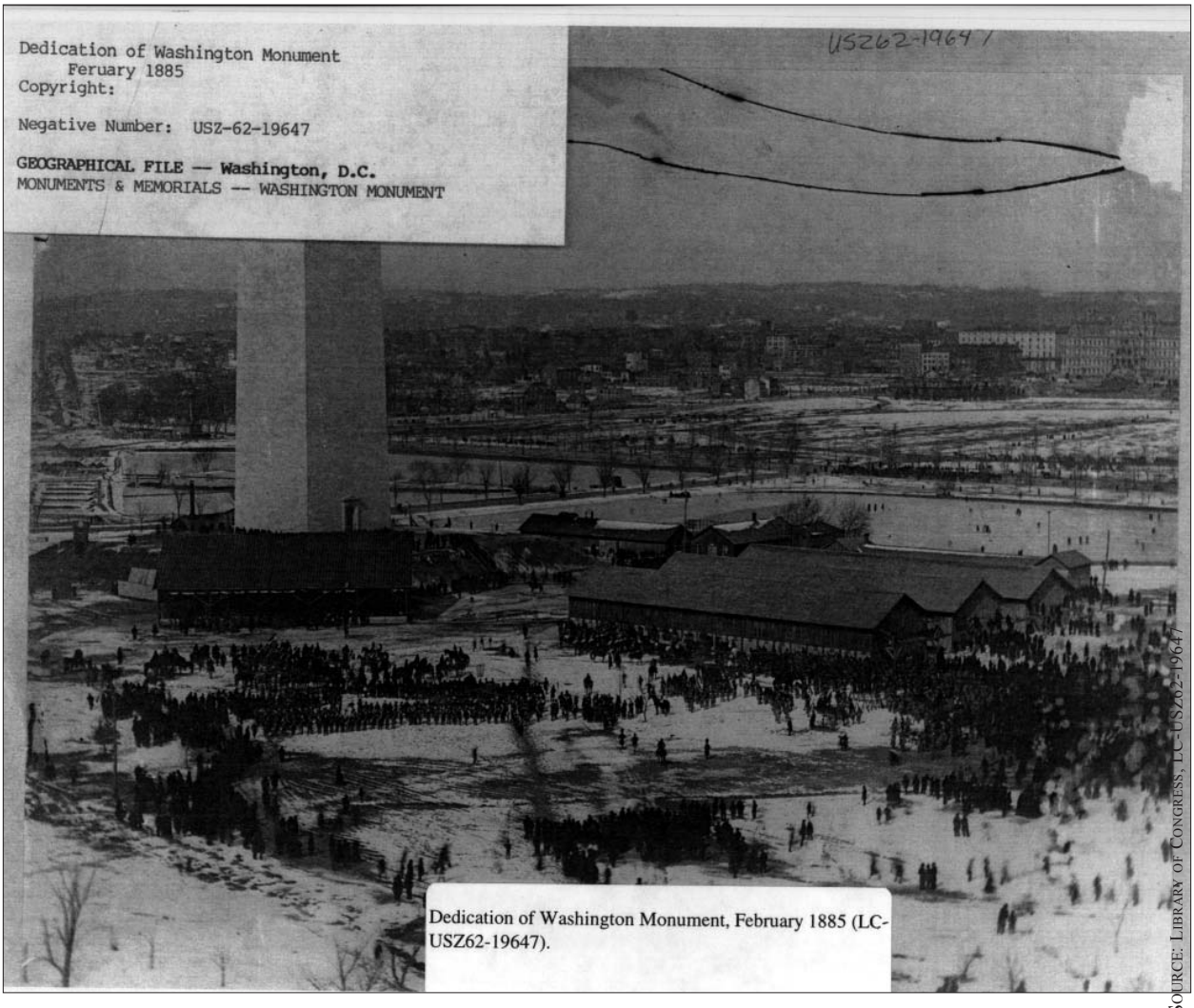
SOURCE: PUBLISHED BY CURRIER AND IVES

Figure 2-15. 1880 view of Washington by Charles R. Pearson.



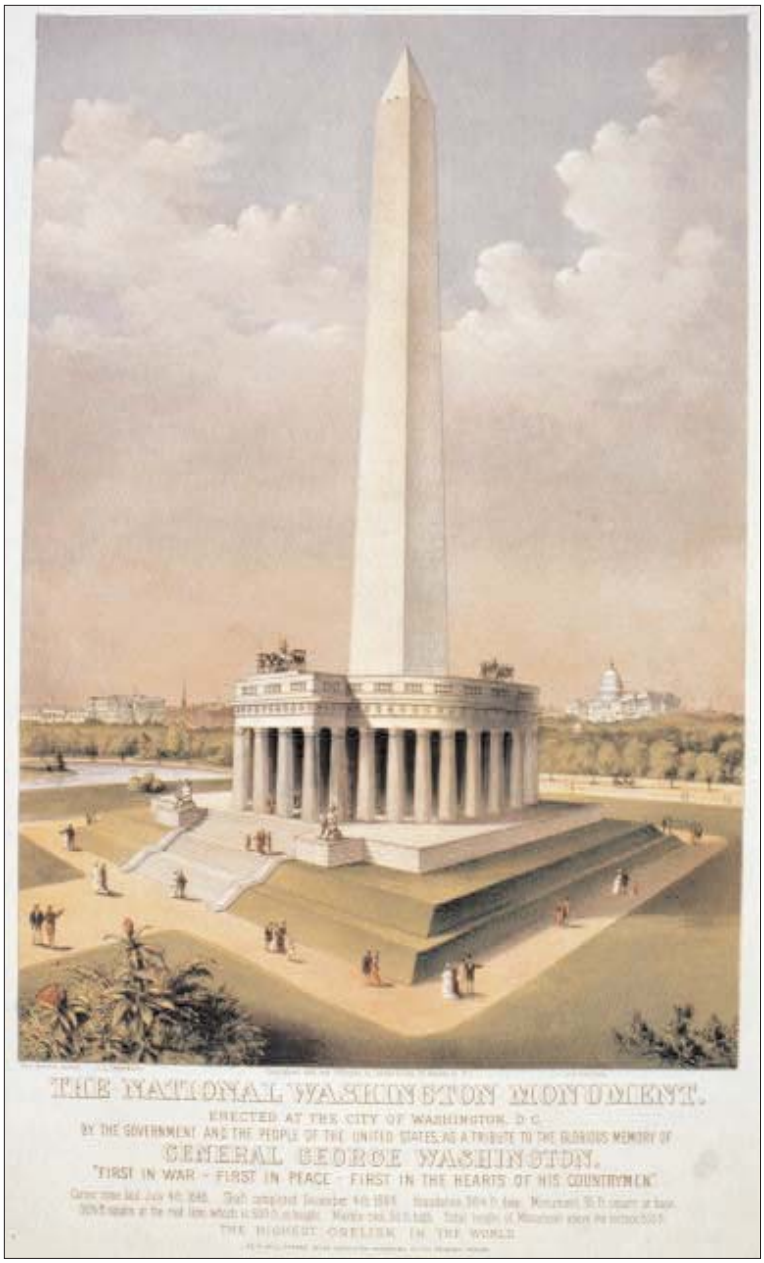
SOURCE: LIBRARY OF CONGRESS (CALL # G3851.A3 1884 .S3 VAULT OVERSIZE)

Figure 2-16. View of Washington by Adolf Sachse, detail ca. 1884.



SOURCE: LIBRARY OF CONGRESS, LC-USZ62-19647

Figure 2-17. 1885 photograph of the Washington Monument dedication ceremony. Note the three stone-cutting sheds east (right) of the monument, as well as other construction sheds nearby. Also note the earthen terrace covering the reinforced foundations, Babcock Lake (right) and carp pond (upper left), north of the monument.



SOURCE: PUBLISHED BY CURRIER & IVES

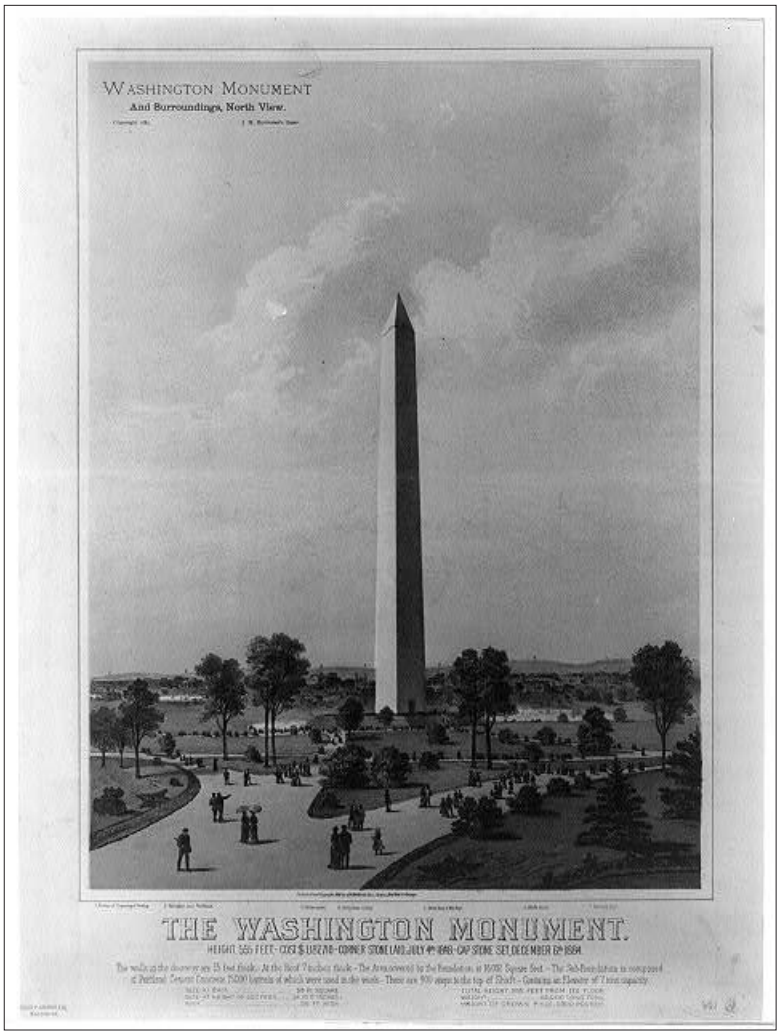
Figure 2-18. 1885 depiction of plans for the monument, with unrealized elements.



THE INAUGURATION—NIGHT SCENE NEAR THE WHITE HOUSE.—[See Page 170.]

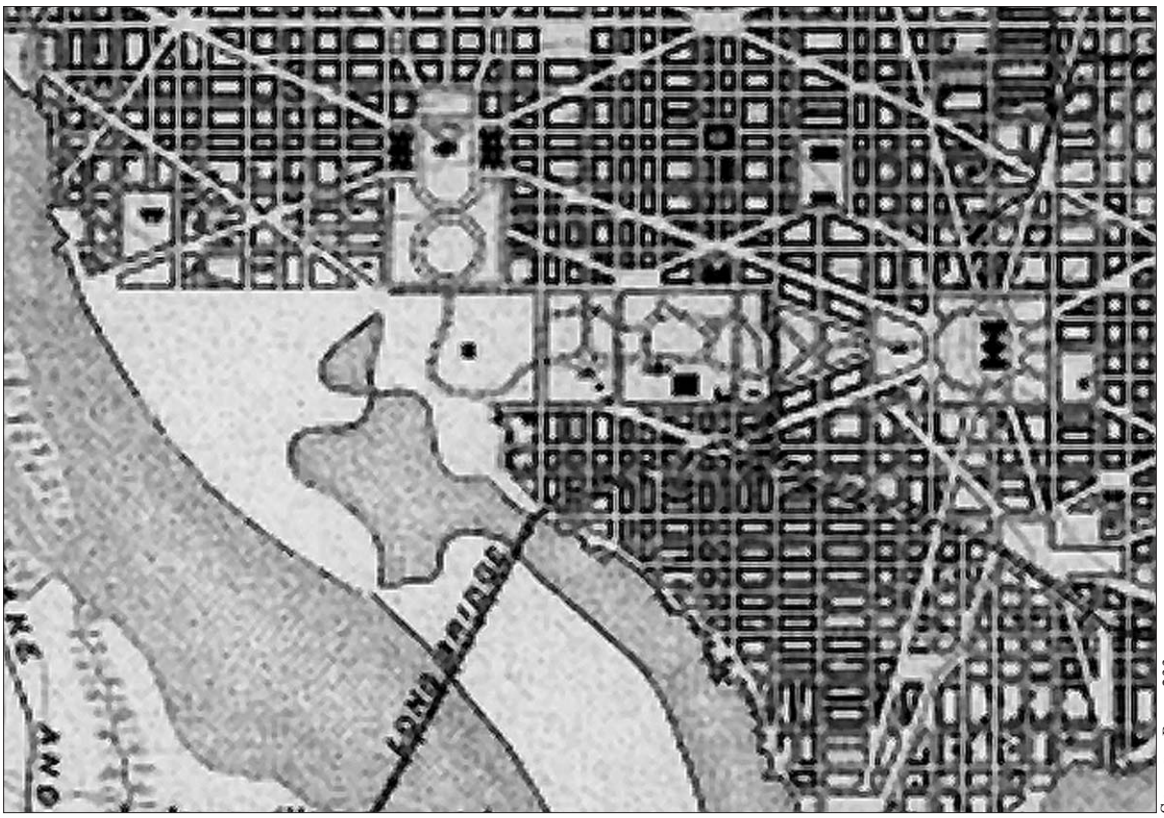
SOURCE: LIBRARY OF CONGRESS (CALL # ILLUS,. IN AP2.H32 1885)

Figure 2-19. 1885 Harper's Weekly illustration of fireworks.



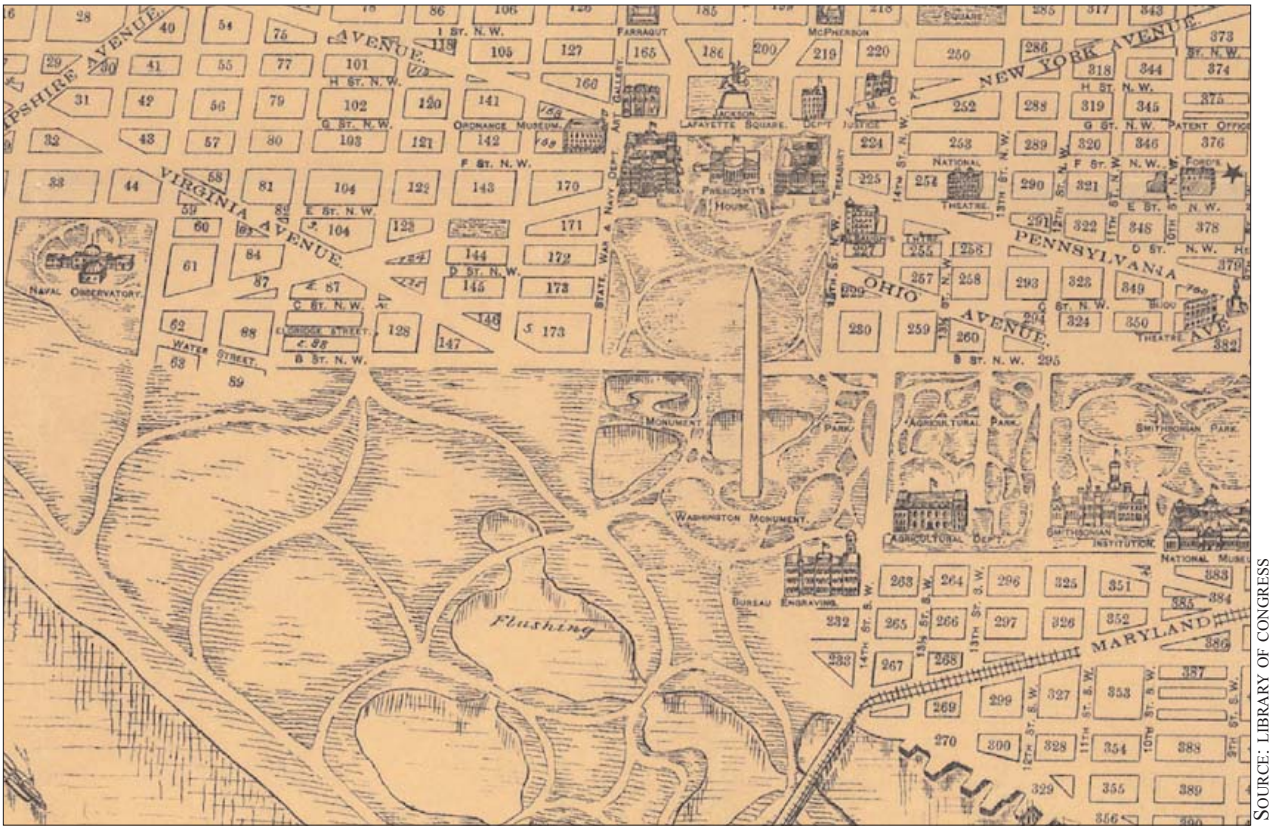
SOURCE: LIBRARY OF CONGRESS (CALL # LC USZ62-25572)

Figure 2-20. 1886 engraving of the Washington Monument and Grounds. This shows the grounds largely as they would have appeared at this time, with the square terrace at the foot of the monument and the curvilinear paths and trees in the outer portions of the Monument Grounds. The remaining construction sheds were not included, for artistic purposes (compare to Figure 2-25),



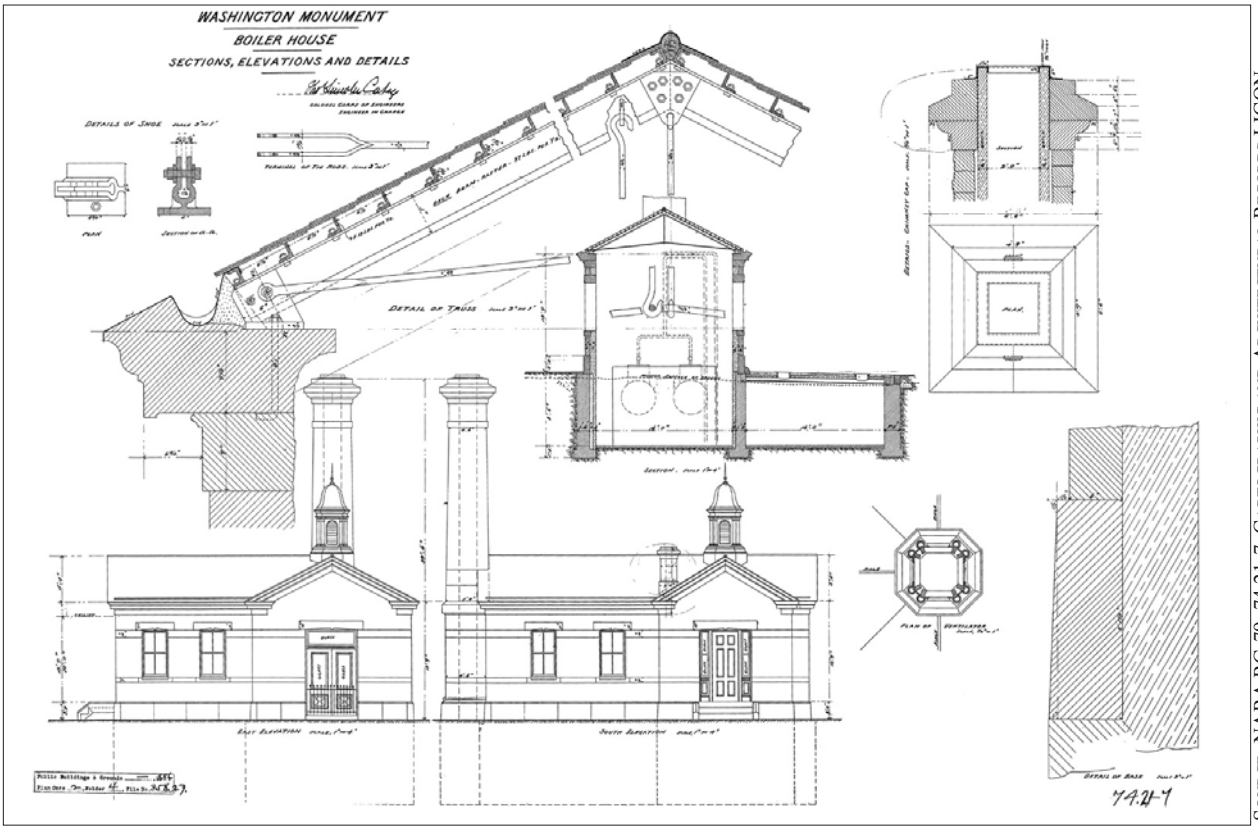
SOURCE: REPS, 233

Figure 2-21. 1891 U.S. Geological Survey map for Washington, detail.
From Geological Survey of 1885-86, 1891. Note the configuration of the Potomac Flats, now West and East Potomac Parks, including the Tidal Basin with a remnant of the Tiber Creek west of the Washington Monument.



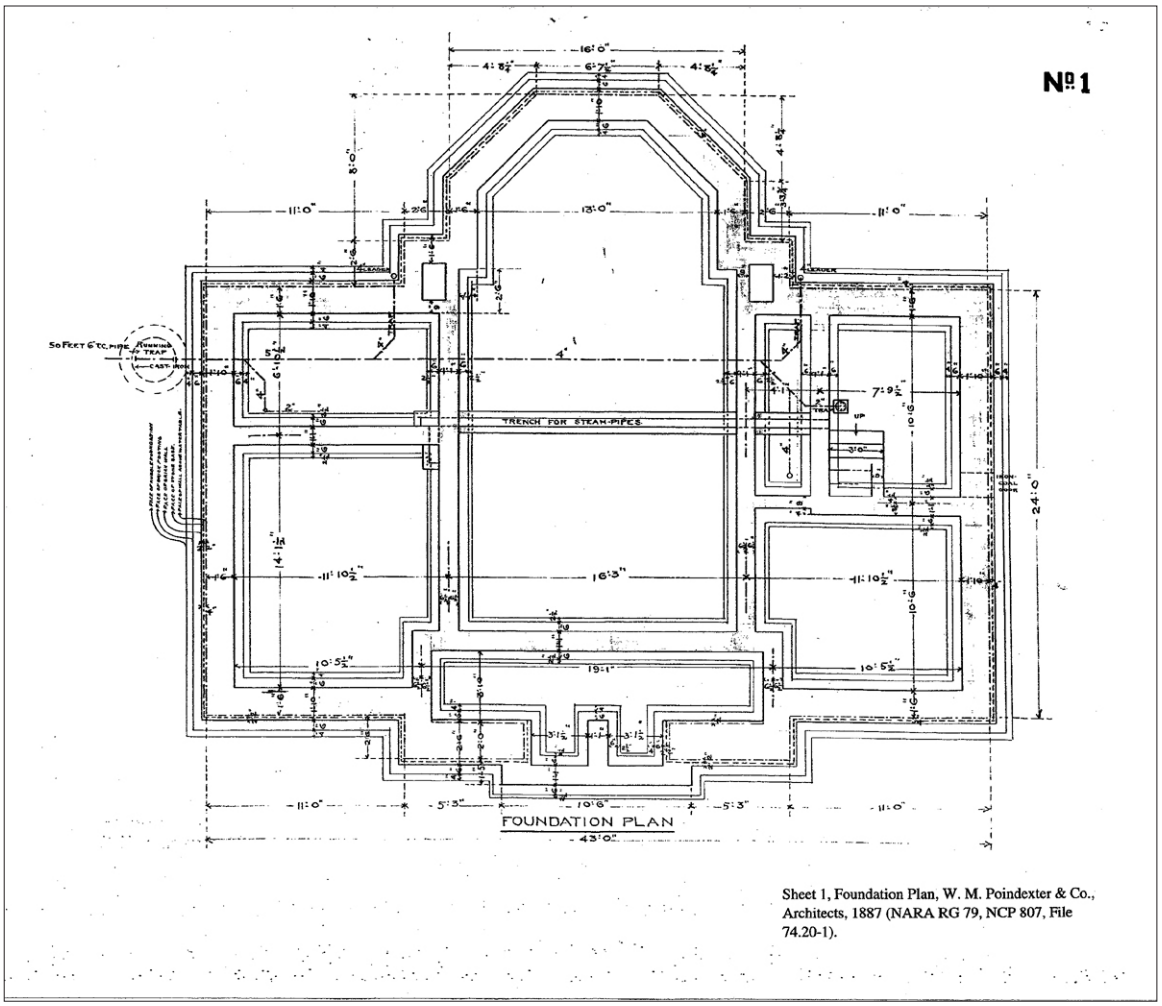
SOURCE: LIBRARY OF CONGRESS

Figure 2-22. 1886 view, by B.H. Warner & Co., detail. This view shows the Washington Monument Grounds before the dredging of the Tidal Basin was completed.



SOURCE: NARA RG 79, 74.21-7, CARTOGRAPHIC AND ARCHITECTURAL RECORDS LICON, SPECIAL MEDIA ARCHIVE DIVISION, COLLEGE PARK, MD

Figure 2-23. 1886 elevation, section, and details of Boiler House (Survey Lodge).



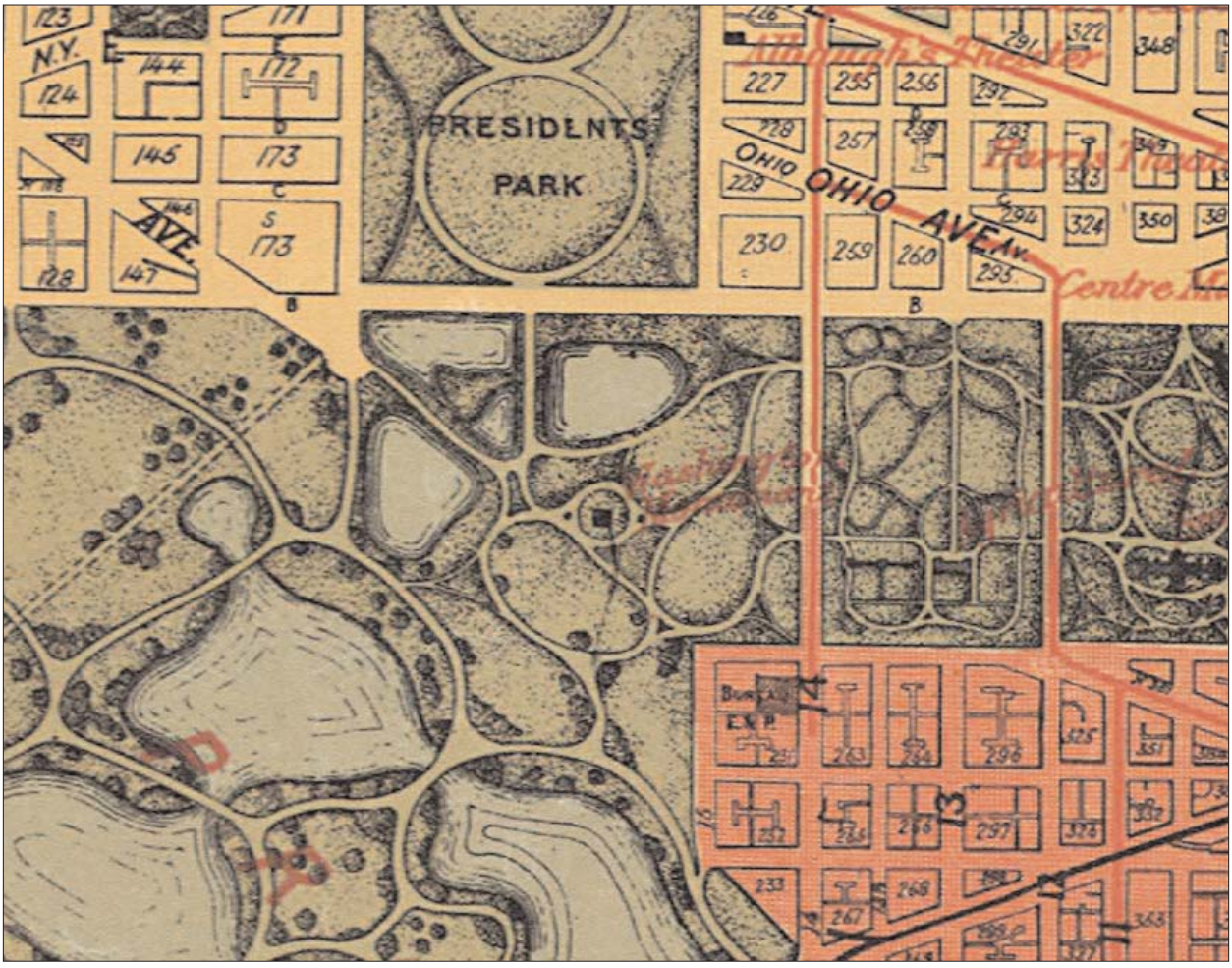
SOURCE: FILE 74.20-1, NCP 807, RECORD GROUP 79 [RG 79], CARTOGRAPHIC AND ARCHITECTURAL RECORDS LICON, SPECIAL MEDIA ARCHIVES SERVICES DIVISION, COLLEGE PARK, MD

Figure 2-24. 1887 plan of Building for Public Comfort (Monument Lodge).



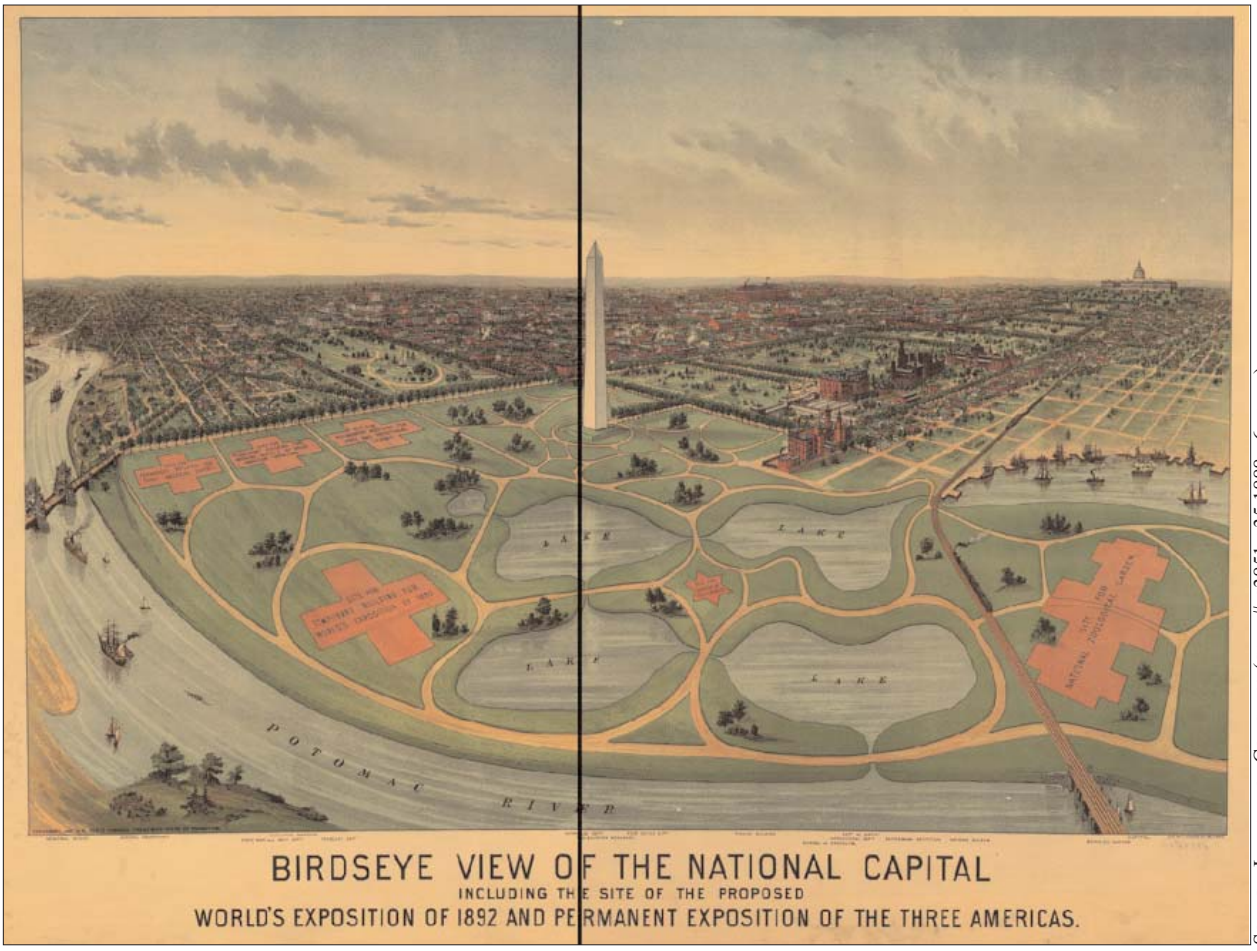
SOURCE: PRINTS AND PHOTOGRAPHS DIVISION, LC-USZ62-59538, LIBRARY OF CONGRESS, WASHINGTON, D.C. (CALL # LC-USZ62-77140)

Figure 2-25. 1887 photograph of encampment on the Grounds near the end of construction. The grounds are not yet complete: note the square, steeply sloped terrace still surrounding the base of the monument.



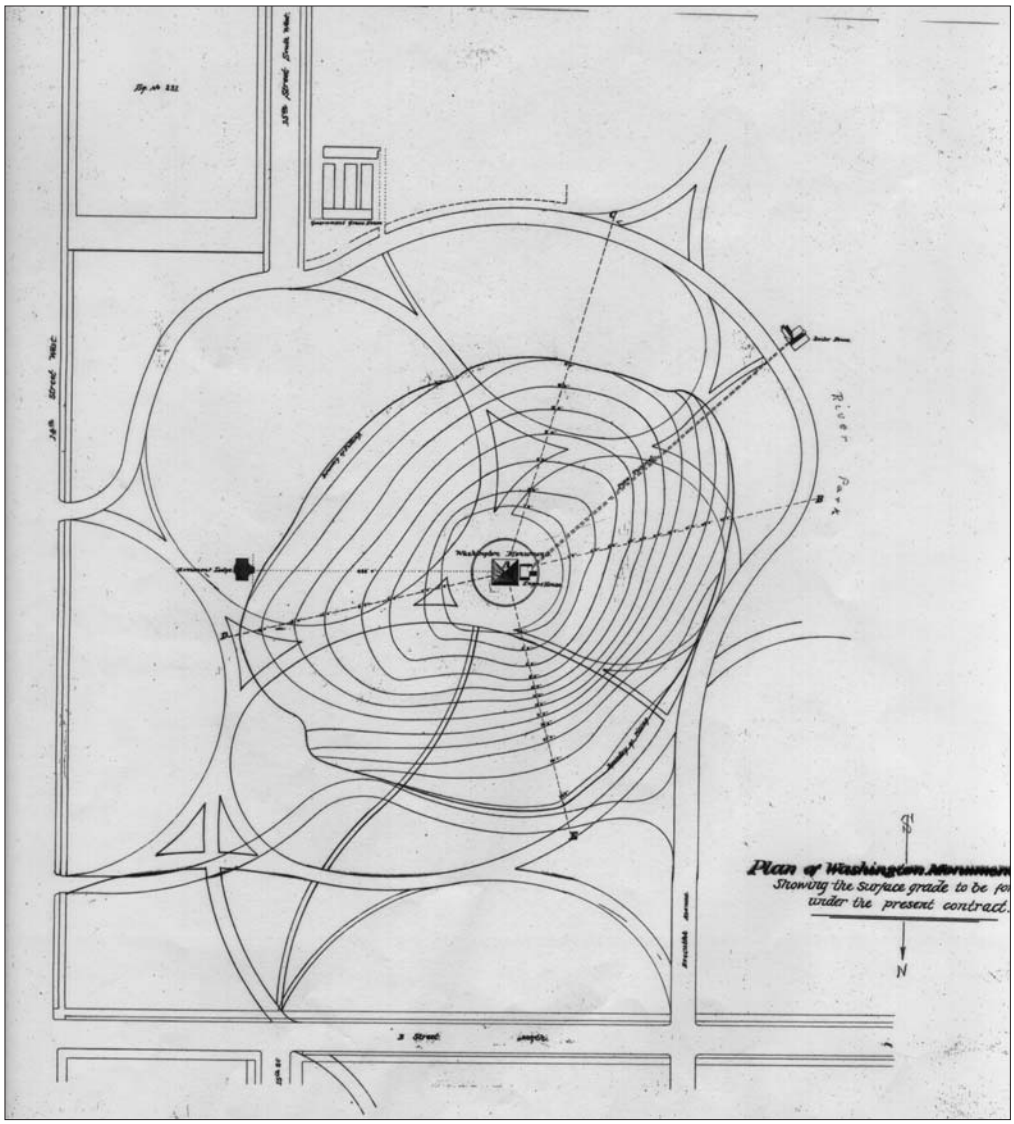
SOURCE: LIBRARY OF CONGRESS

Figure 2-26. 1887 map depicting the ground, by Axel Silversparre, detail. It is likely that many of the curvilinear roads and paths depicted here did not exist at this time.



SOURCE: LIBRARY OF CONGRESS (CALL # G3851.A35 1888 .J6 VAULT)

Figure 2-27. 1888 view of proposed siting of World's Exposition of 1892. Note several never-realized features, such as the four lakes depicted in place of the Tidal Basin, completed a few years later.

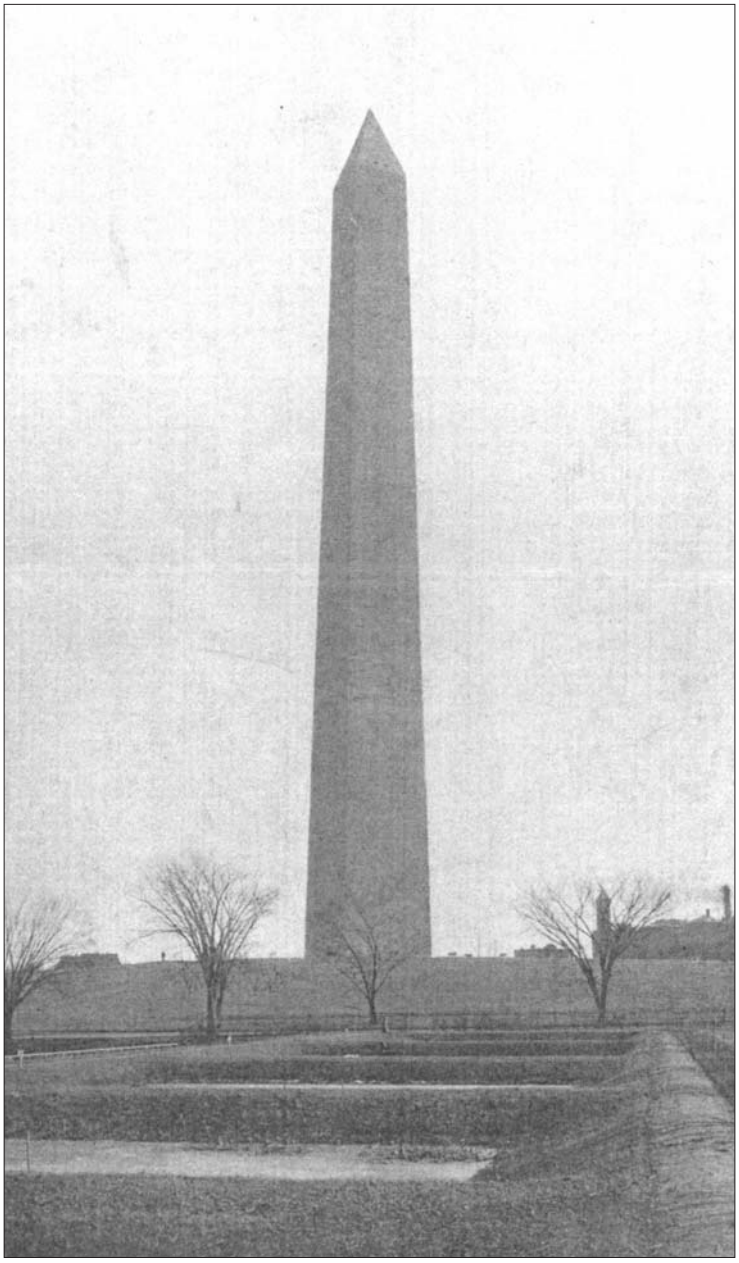


SOURCE: FILE 44-49, NCP , RG 79, CARTOGRAPHIC AND ARCHITECTURAL RECORDS LICON, SPECIAL MEDIA ARCHIVES SERVICES DIVISION, COLLEGE PARK, MD

Figure 2-28. 1889 plan of grading for knoll and planned road and path system. Roads shown on later plans, including 1901 and 1917, appear to follow some of these alignments, but not all roads on this plan appear to have been constructed.

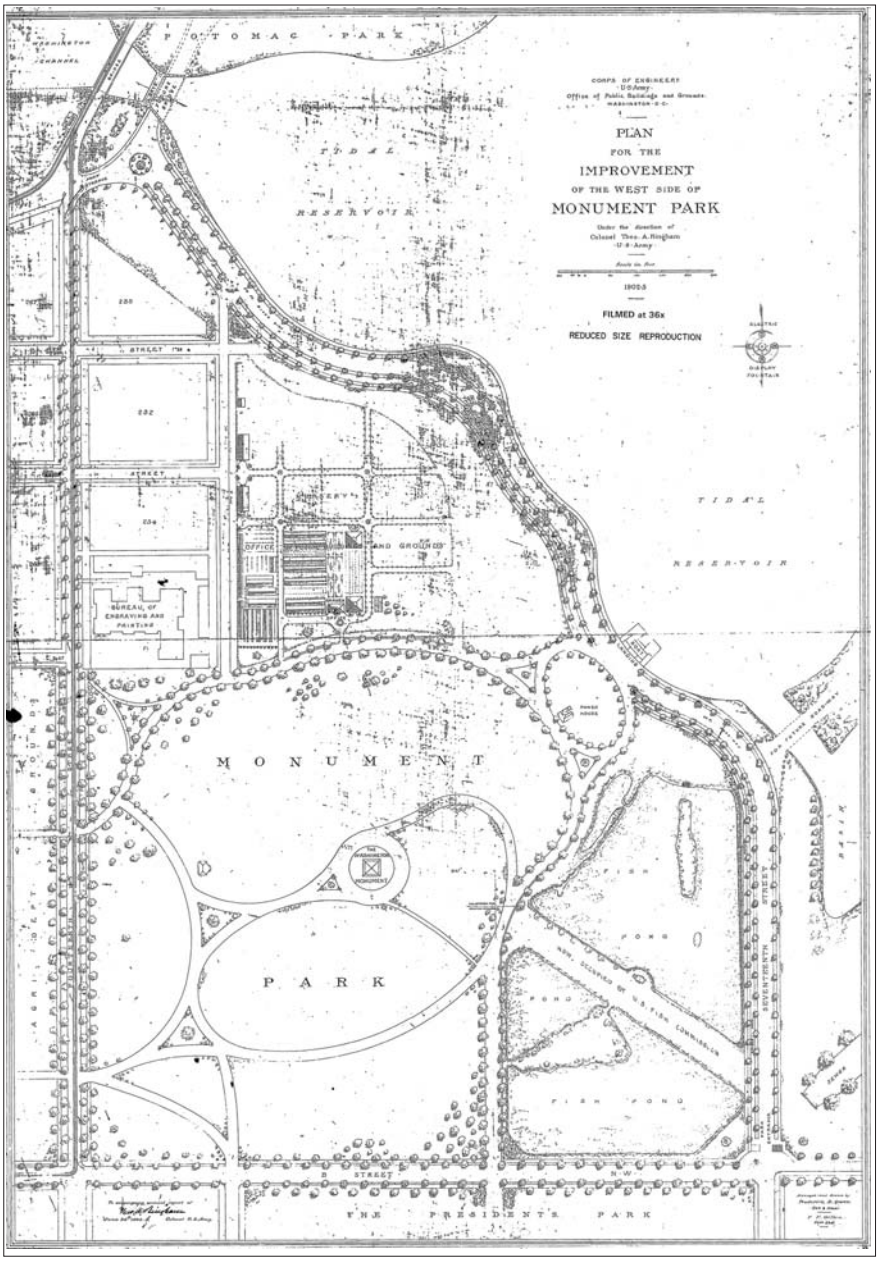


Figure 2-29. 1890s postcard of the monument, Monument Lodge.



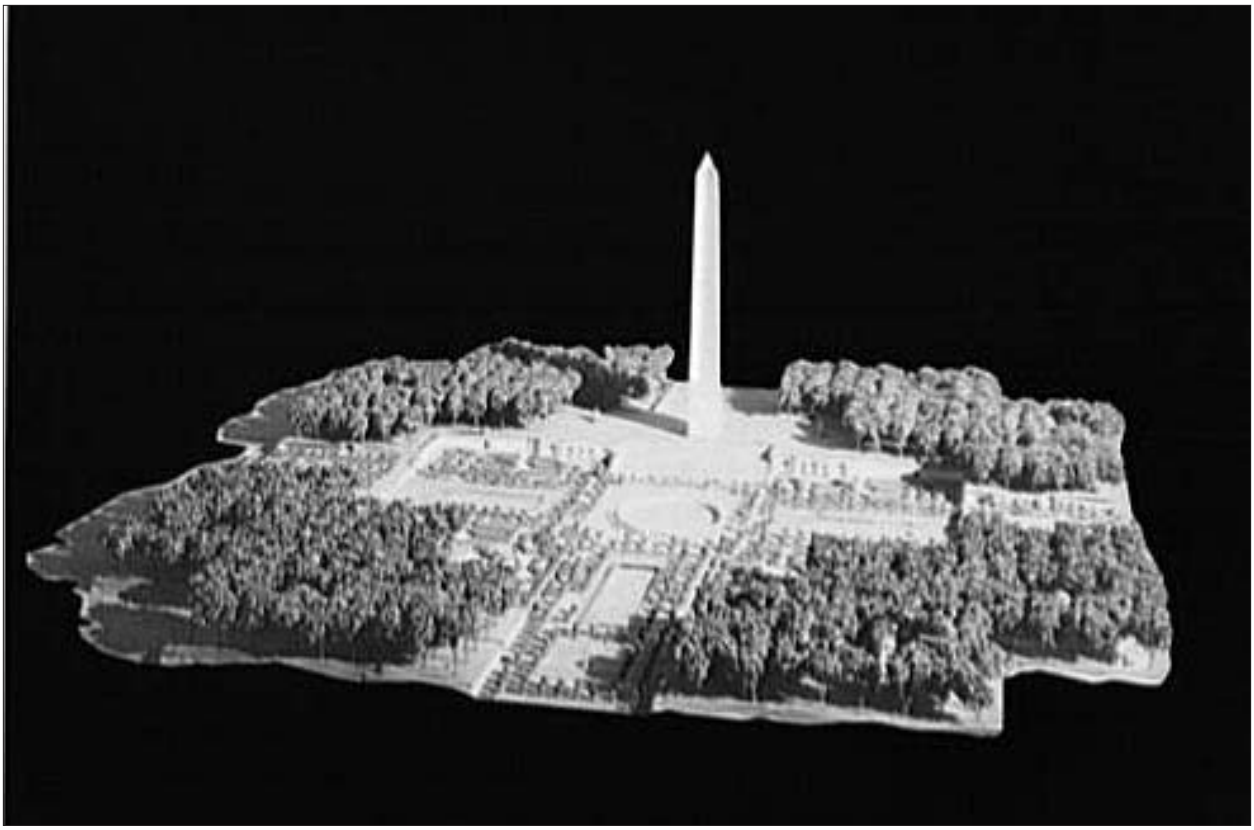
SOURCE: PRINTS AND PHOTOGRAPHS DIVISION, LC-USZ62-59535, LIBRARY OF CONGRESS, WASHINGTON, D.C.

Figure 2-30. 1901 photograph of the fish hatching ponds.



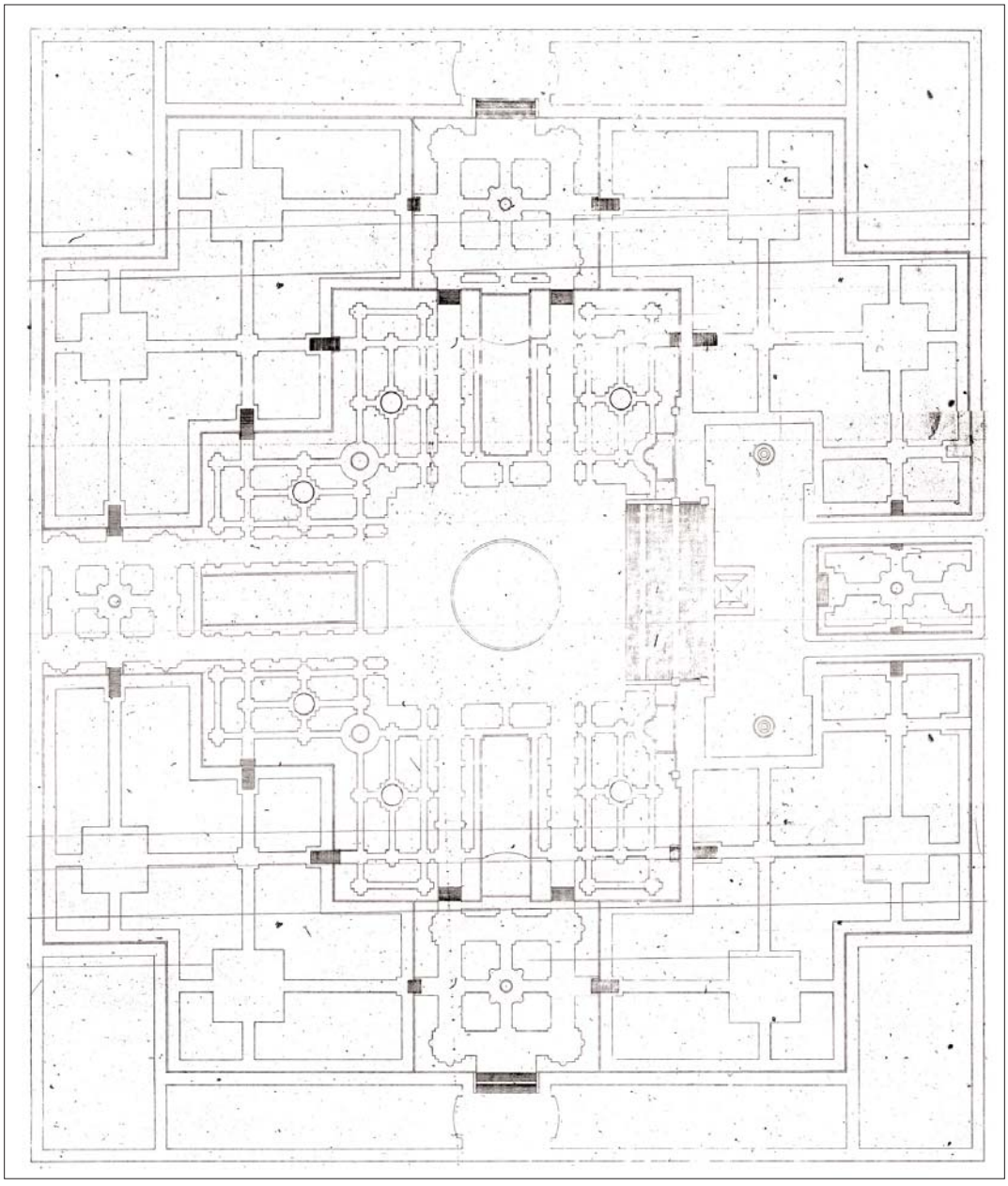
SOURCE: NPS-NCR COLLECTION

Figure 2-31. 1902 plan for improvement to the west side of the grounds.



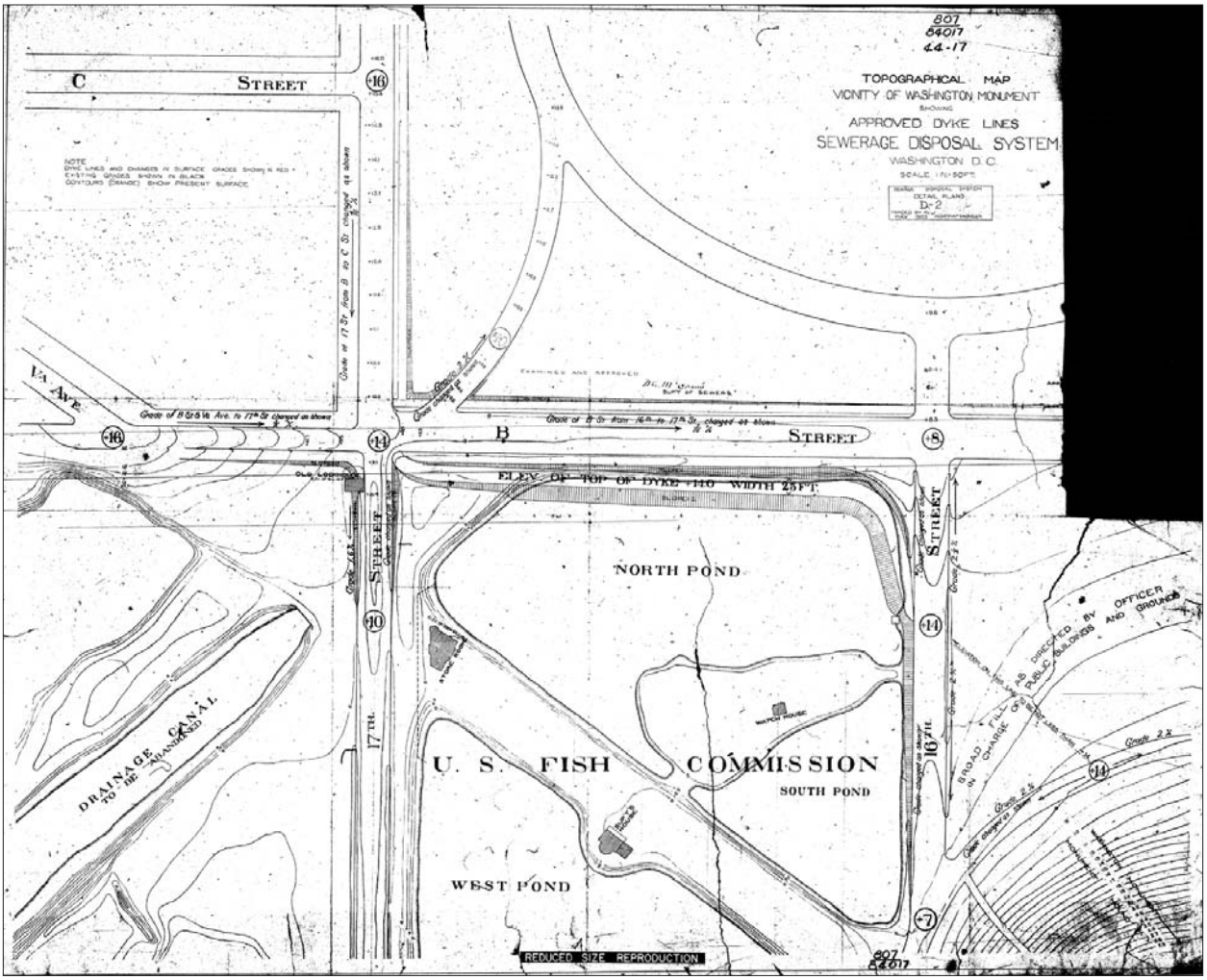
SOURCE: LIBRARY OF CONGRESS (CALL # LC-H824-M04-021-030)

Figure 2-32. 1901-02 model of the McMillan Plan for the Monument Gardens.



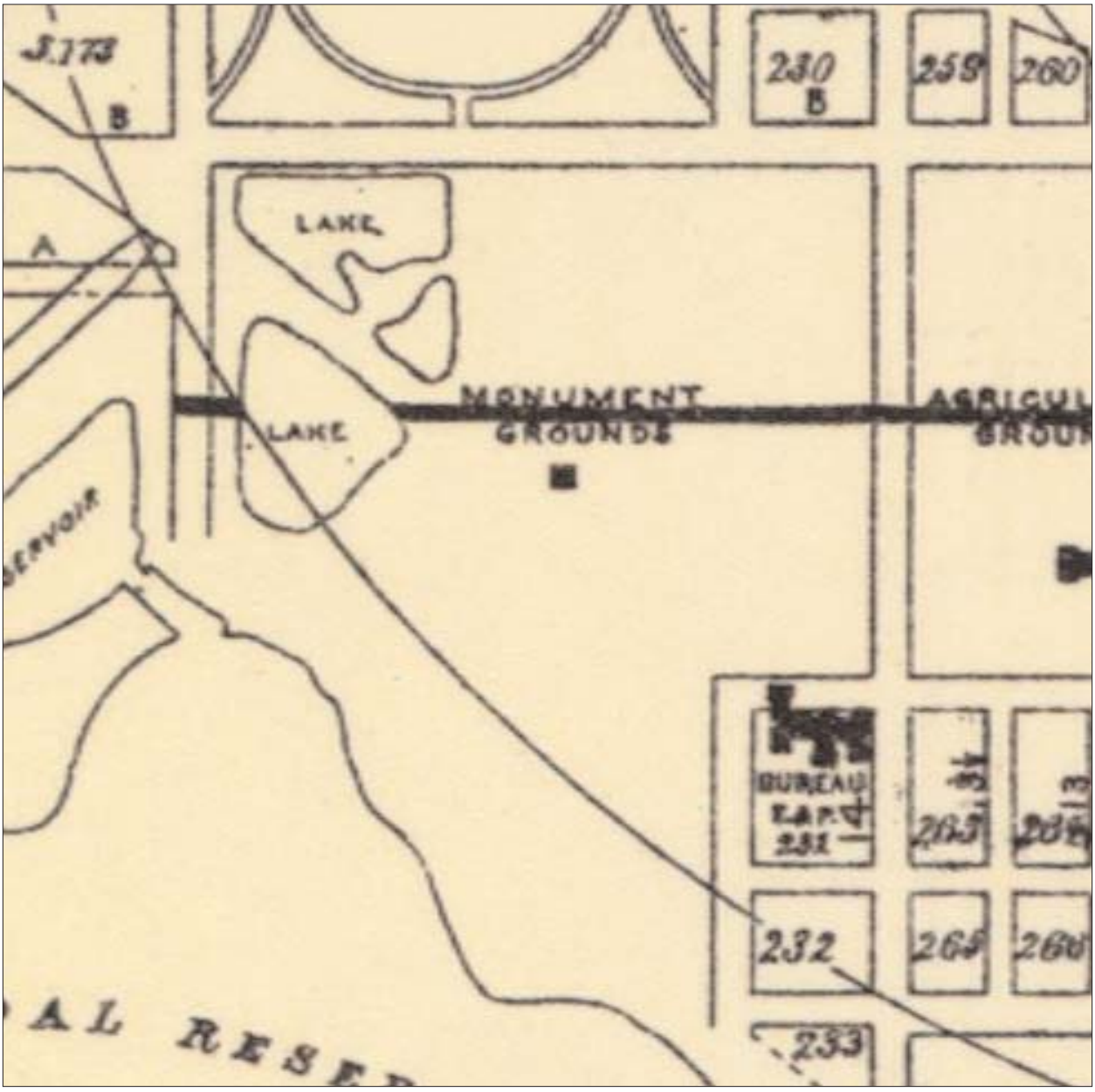
SOURCE: MONUMENT GARDEN, NO. 102, COMMISSION OF FINE ARTS, JANUARY 6, 1911 [IN 2 SECTIONS], NCP 87_84058, FILE 44-58

Figure 2-33. 1901-02 McMillan Commission plan, detail. The circular pool in the center marks the intersection of the Capitol-W ashington Monument axis and the White House axis.



SOURCE: NCP 807_84017, FILE 44-17

Figure 2-34. 1905 topographic map, detail of U.S. Fish Commission ponds. Note the abandoned section of the Washington Canal on the left as well as the various buildings around the fish ponds.



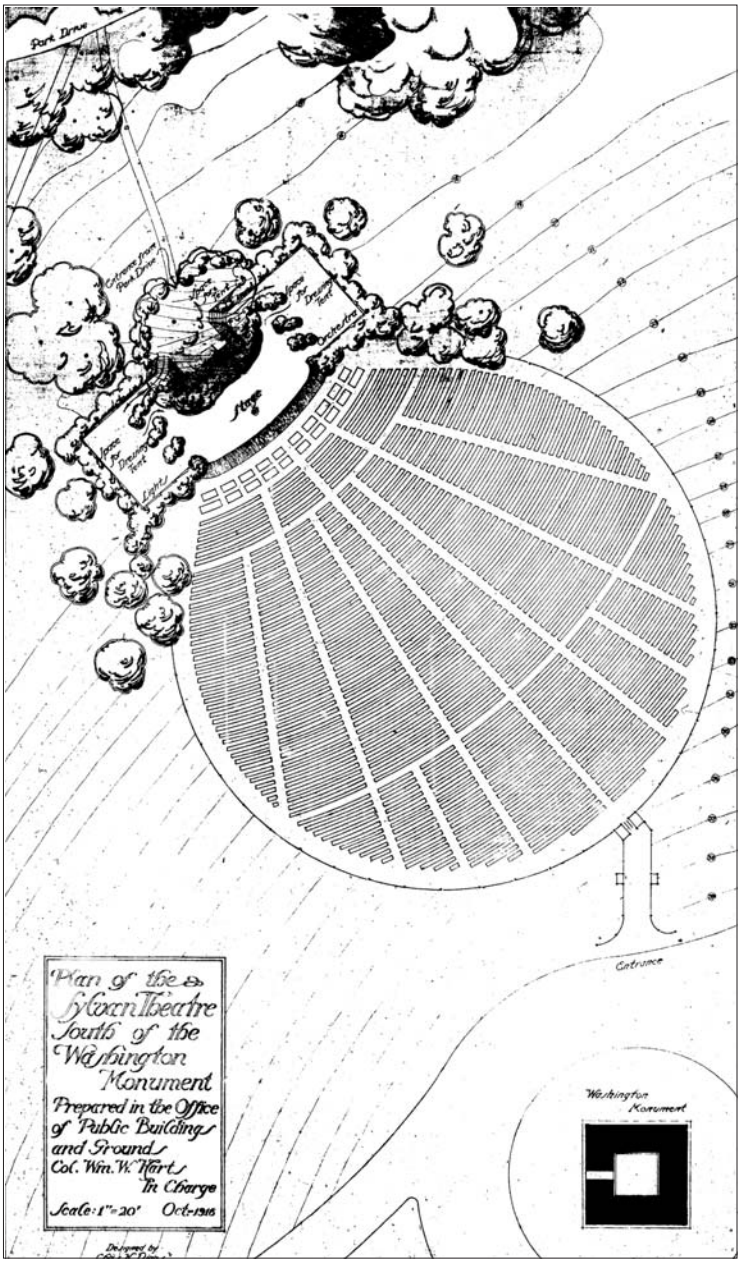
SOURCE: LIBRARY OF CONGRESS (CALL # G3850 1909.W4)

Figure 2-35. 1909 map by M.I. Weller, detail.



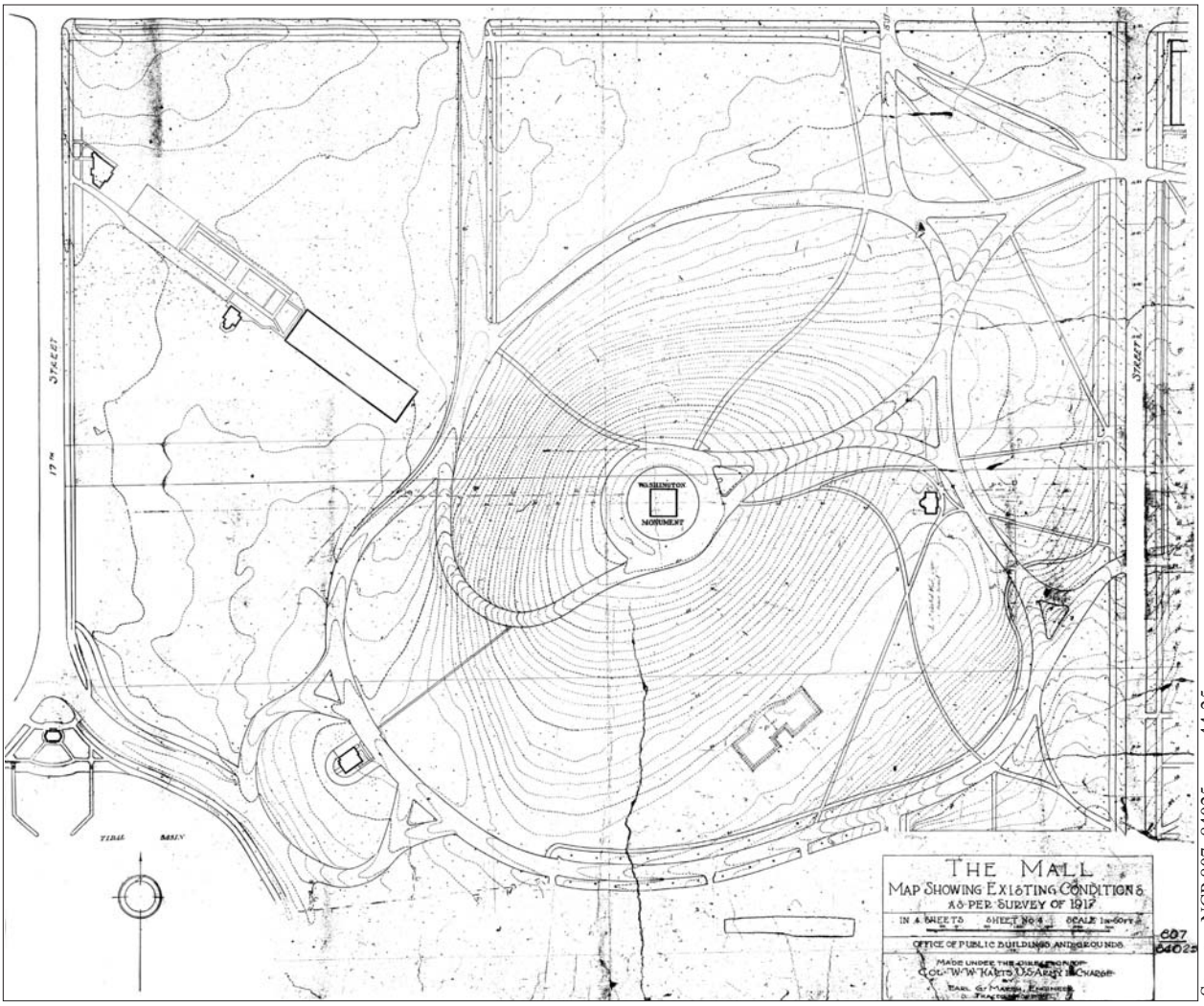
SOURCE: LIBRARY OF CONGRESS (CALL # G3851.A35 1916 .G7)

Figure 2-36. 1916 view by H.H. Green, detail.



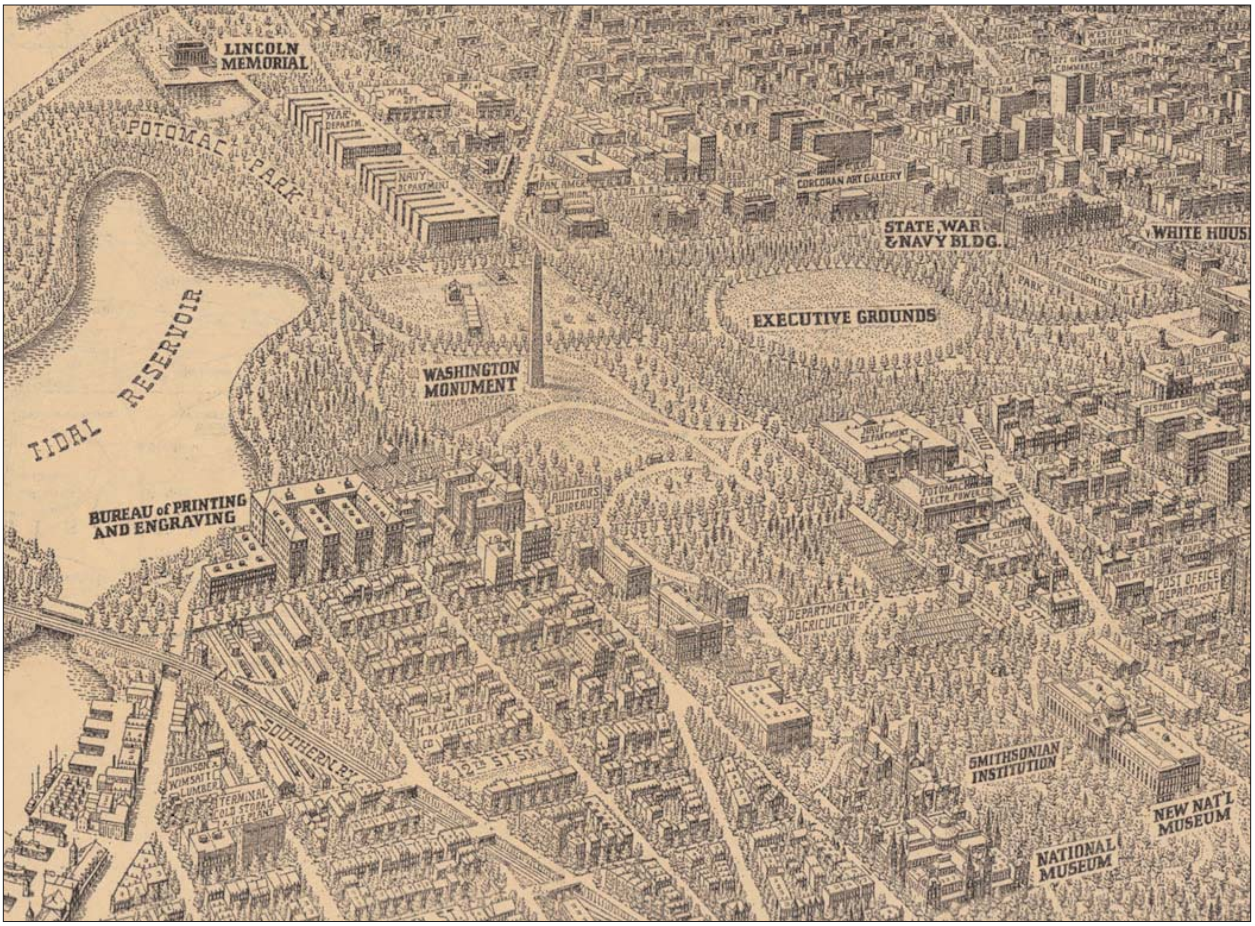
SOURCE: NCP 807_84007, FILE 44-7

Figure 2-37. 1916 plan of the Sylvan Theatre.



SOURCE: NCP 807_84025, FILE 44-25

Figure 2-38. 1917 map of existing conditions at the Monument Grounds.



SOURCE: LIBRARY OF CONGRESS (CALL # G3851.A3 1923 .O4)

Figure 2-39. 1923 view created for B&O Railroad Co., detail.



SOURCE: WASHINGTONIANA DIVISION (13193), MARTIN LUTHER KING, JR. MEMORIAL LIBRARY, WASHINGTON, D.C.

Figure 2-40. 1923 photograph of the Washington Monument Grounds looking west. Note the Monument Lodge in the foreground, the swimming pools and tennis courts and filled-in carp ponds in the middle right.



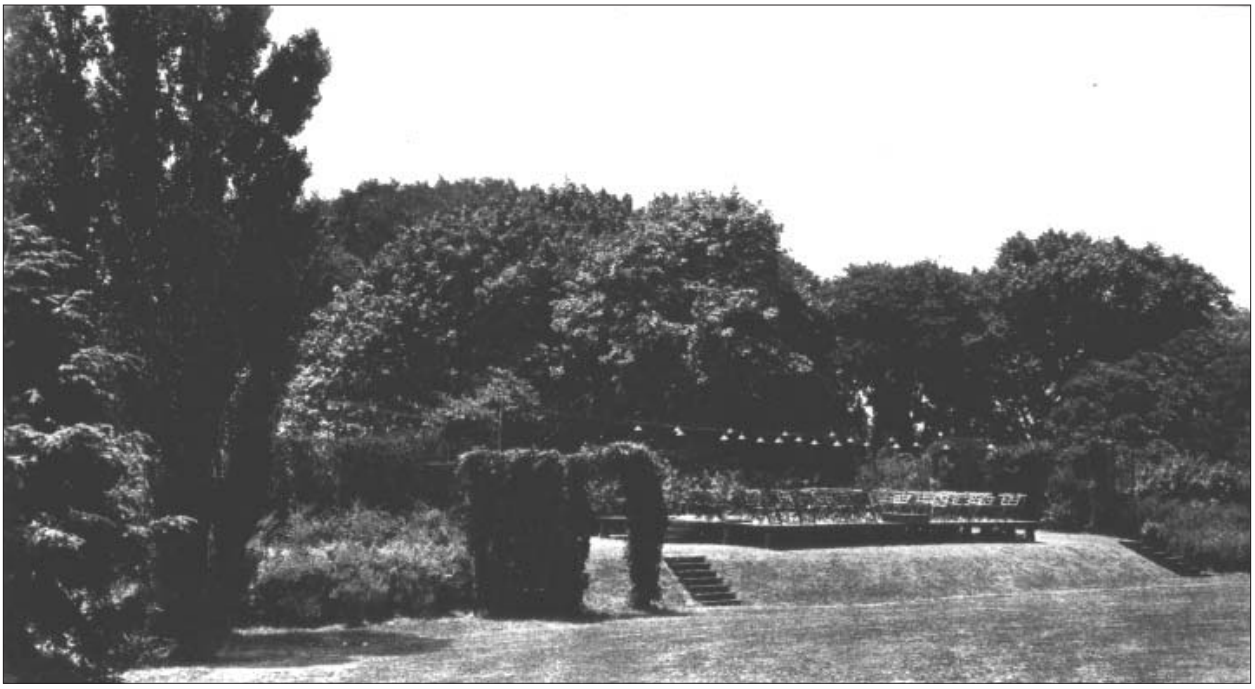
SOURCE: NPS-NCR COLLECTION

Figure 2-41. 1932 view of Monument Lodge.



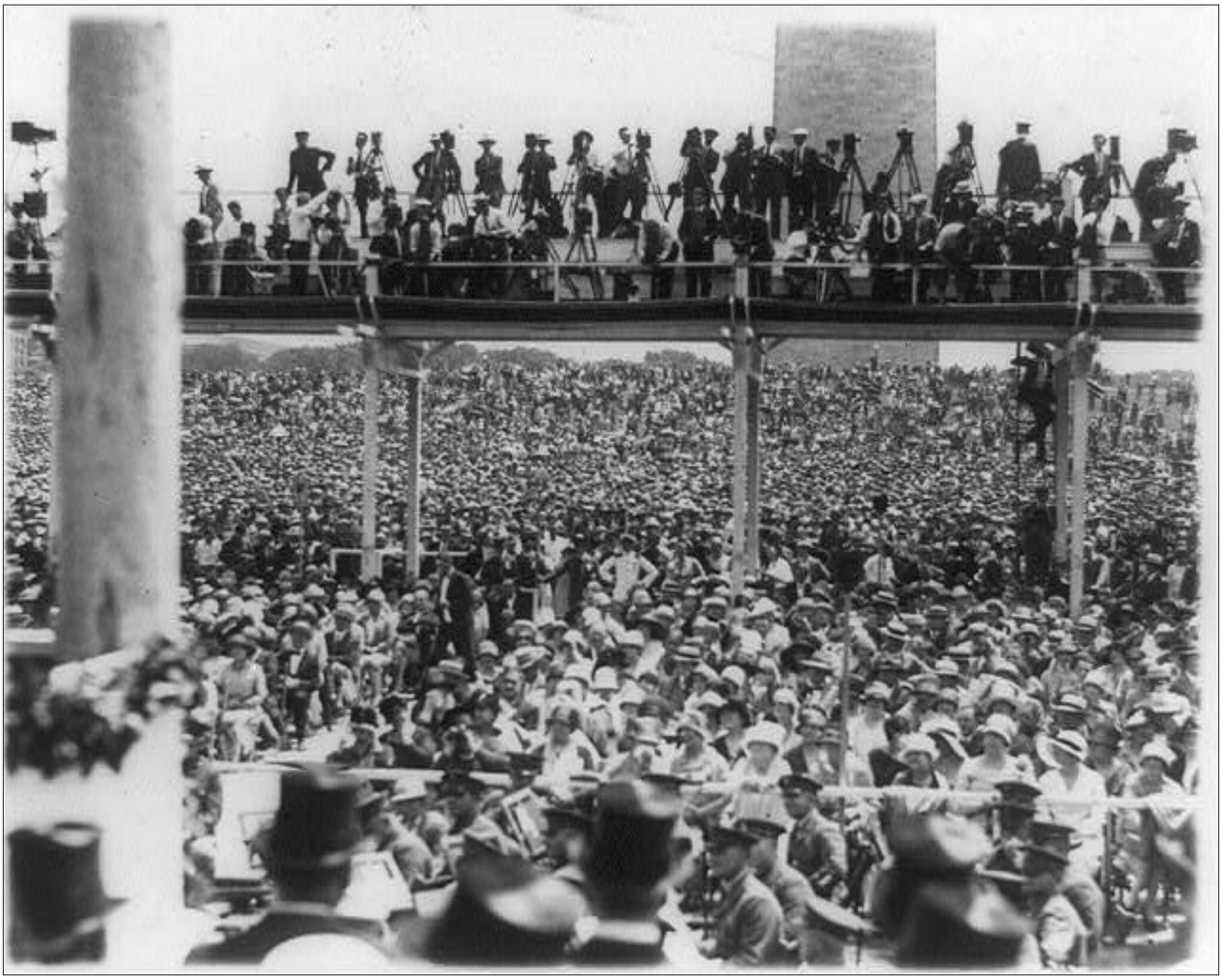
SOURCE: LIBRARY OF CONGRESS (CALL #LC-H8113-2261)

Figure 2-42. 1930S photograph of tennis courts. Note the U.S. Fish Commission Superintendent's house.



SOURCE: OPBPPNC, ANNUAL REPORT OF THE DIRECTOR, 1930.

Figure 2-43. 1930 photograph of the Sylvan Theatre set up for a band concert.



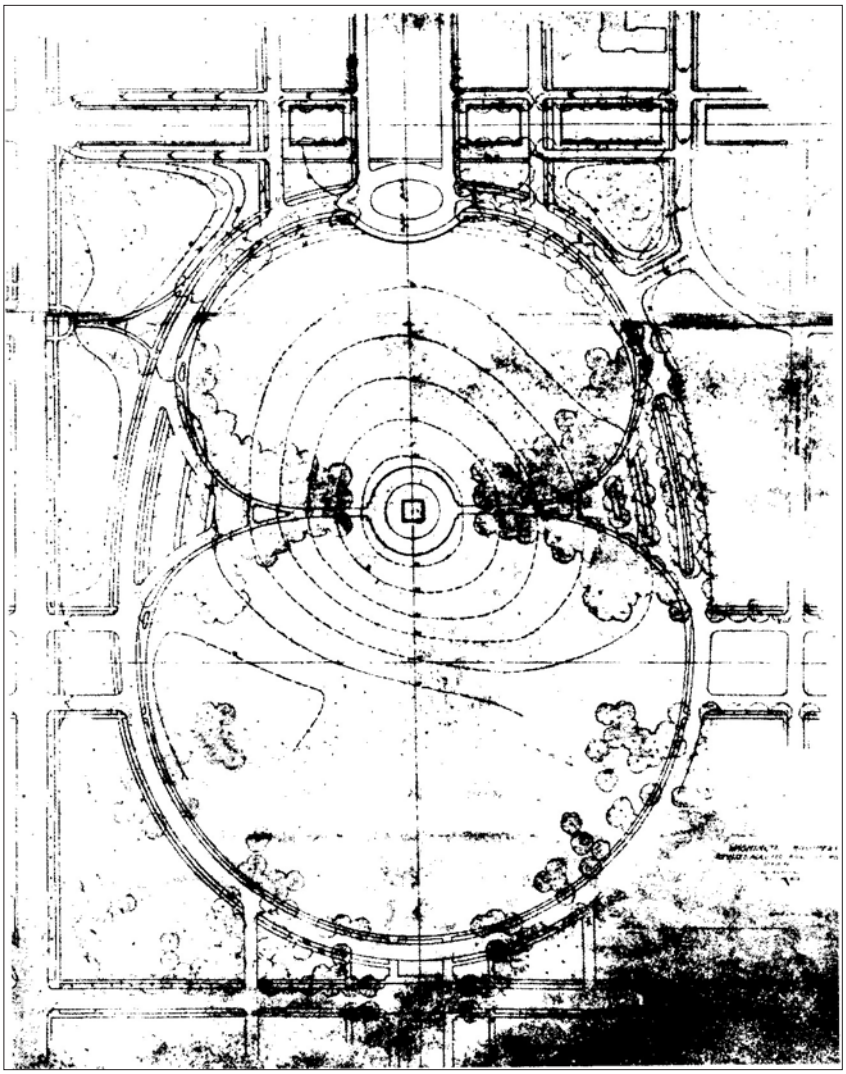
SOURCE: LIBRARY OF CONGRESS (CALL # LC-USZ62-97502)

Figure 2-44. 1927 Distinguished Flying Cross Ceremony to welcome Charles Lindbergh. View of photography corps with monument in background.



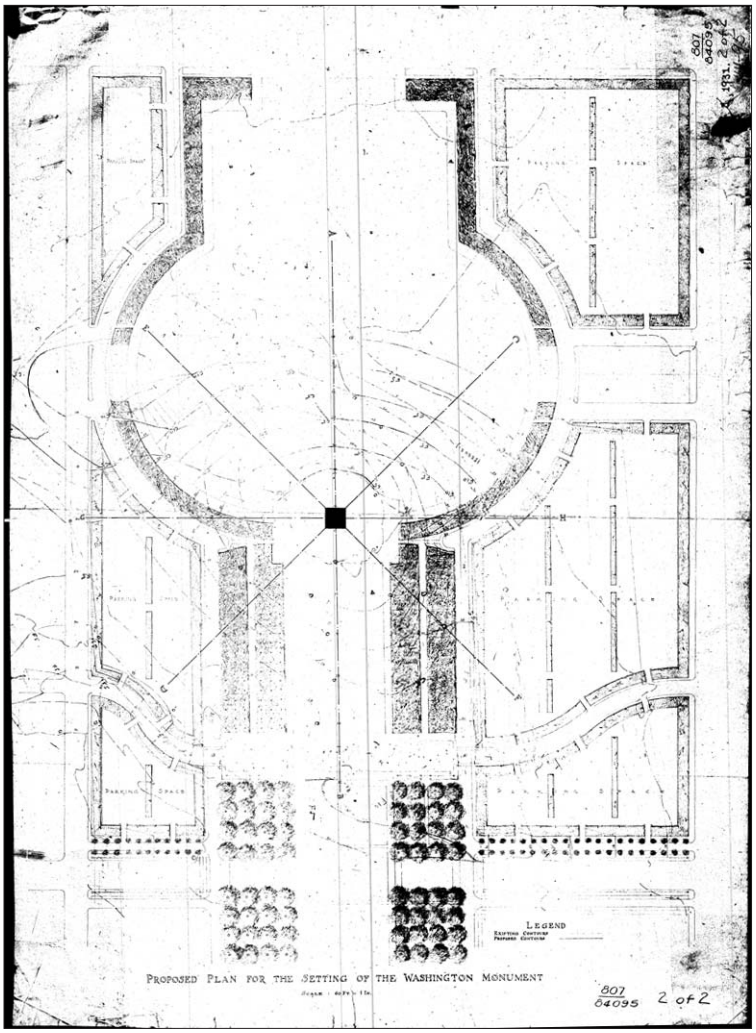
SOURCE: LIBRARY OF CONGRESS (CALL #LC-USZ62-62679)

Figure 2-45. 1927 Distinguished Flying Cross Ceremony to welcome Charles Lindbergh.View of Lindbergh addressing the assembled crowds.



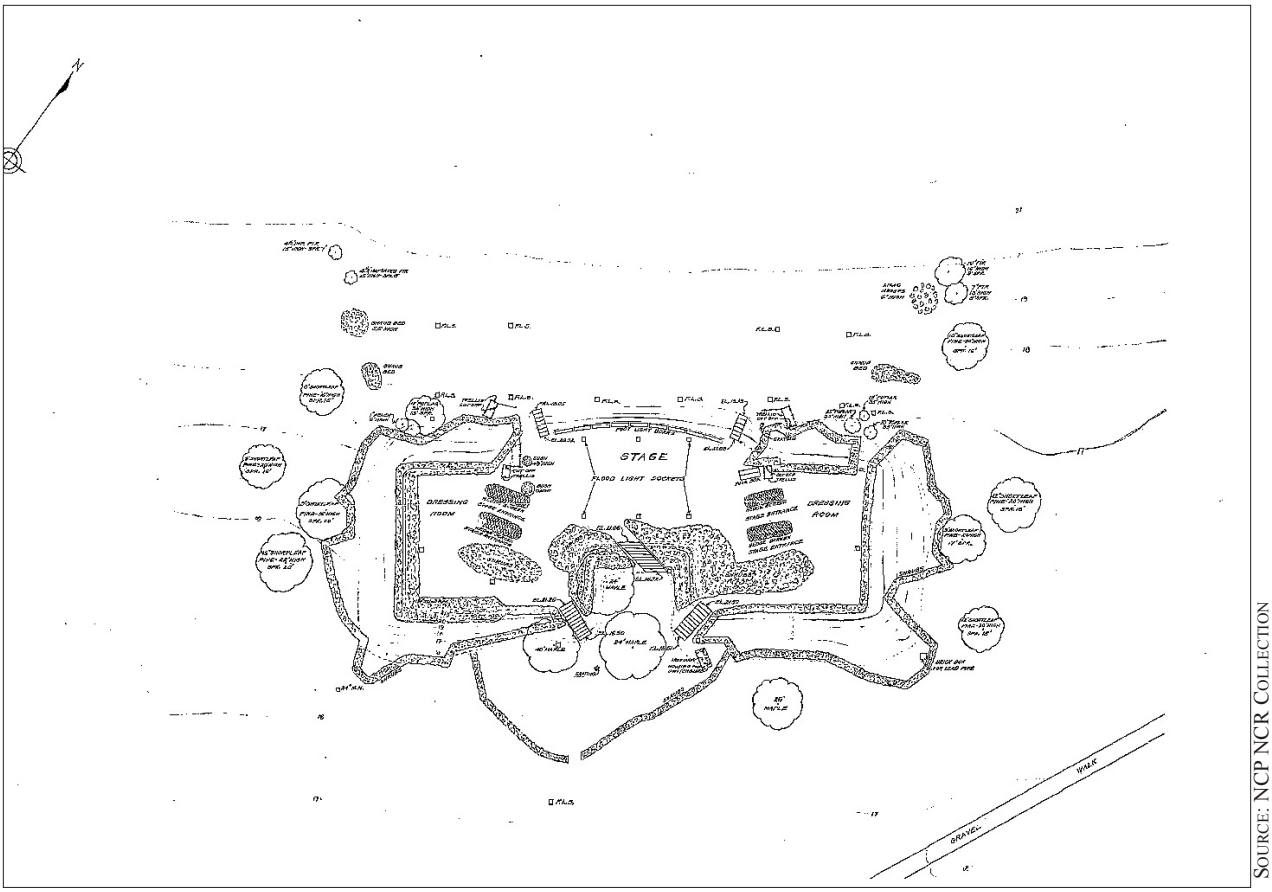
SOURCE: LONGSTRETH, ED. MALL IN WASHINGTON, 134

Figure 2-46. 1931 Informal Plan for the Monument Grounds, by Olmsted and Hubbard.



SOURCE: NCP, FILE 807_84095, PAGE 3

Figure 2-47. 1931 Formal (or Balustrade) Plan for Monument Grounds, by William Delano.



SOURCE: NCP NCR COLLECTION

Figure 2-48. Topographic survey showing plantings around Sylvan Theatre.



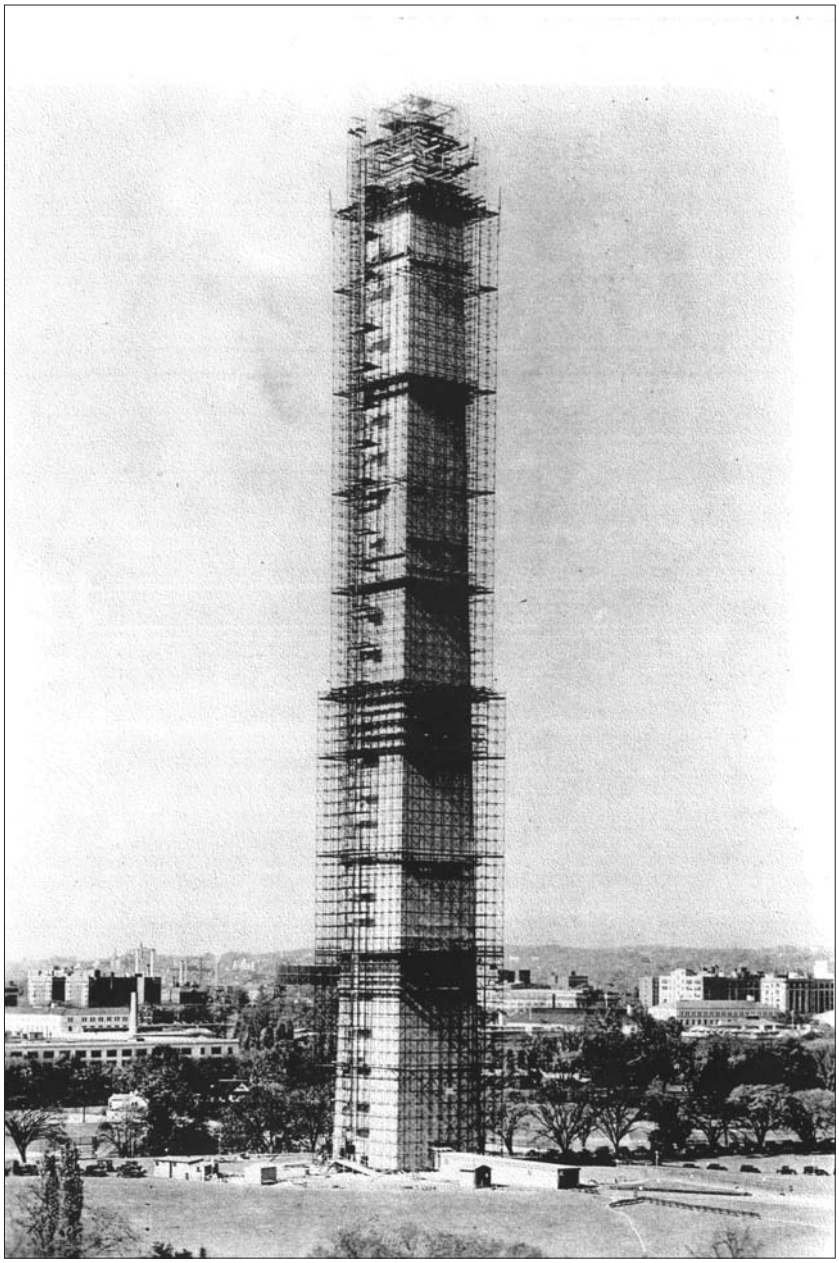
SOURCE: LIBRARY OF CONGRESS (CALL #LC-USZ62-91908)

Figure 2-49. 1932 photograph of blimp with wreath to mark Geor ge Washington's birthday.



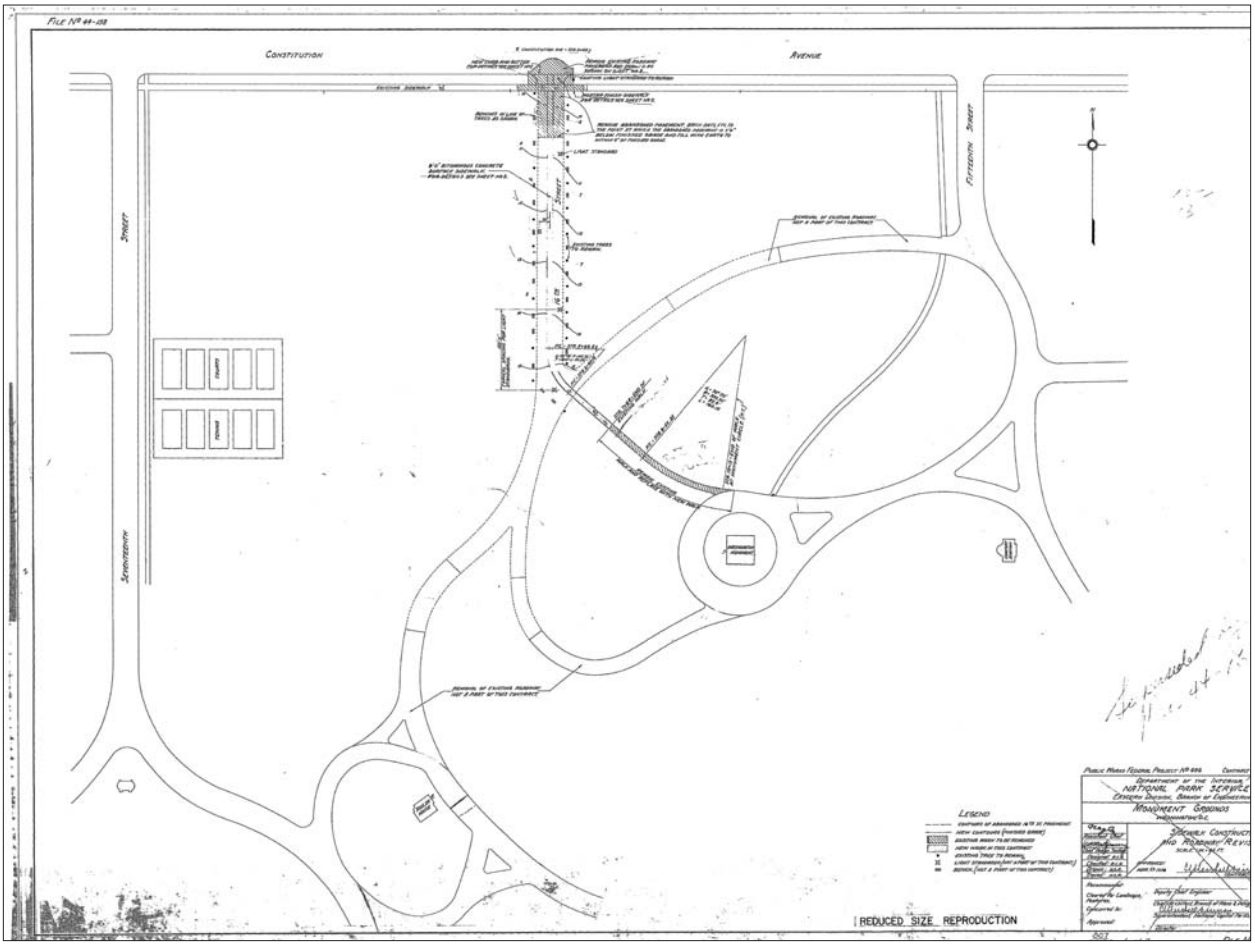
SOURCE: LIBRARY OF CONGRESS

Figure 2-50. 1933 photograph of August flood.



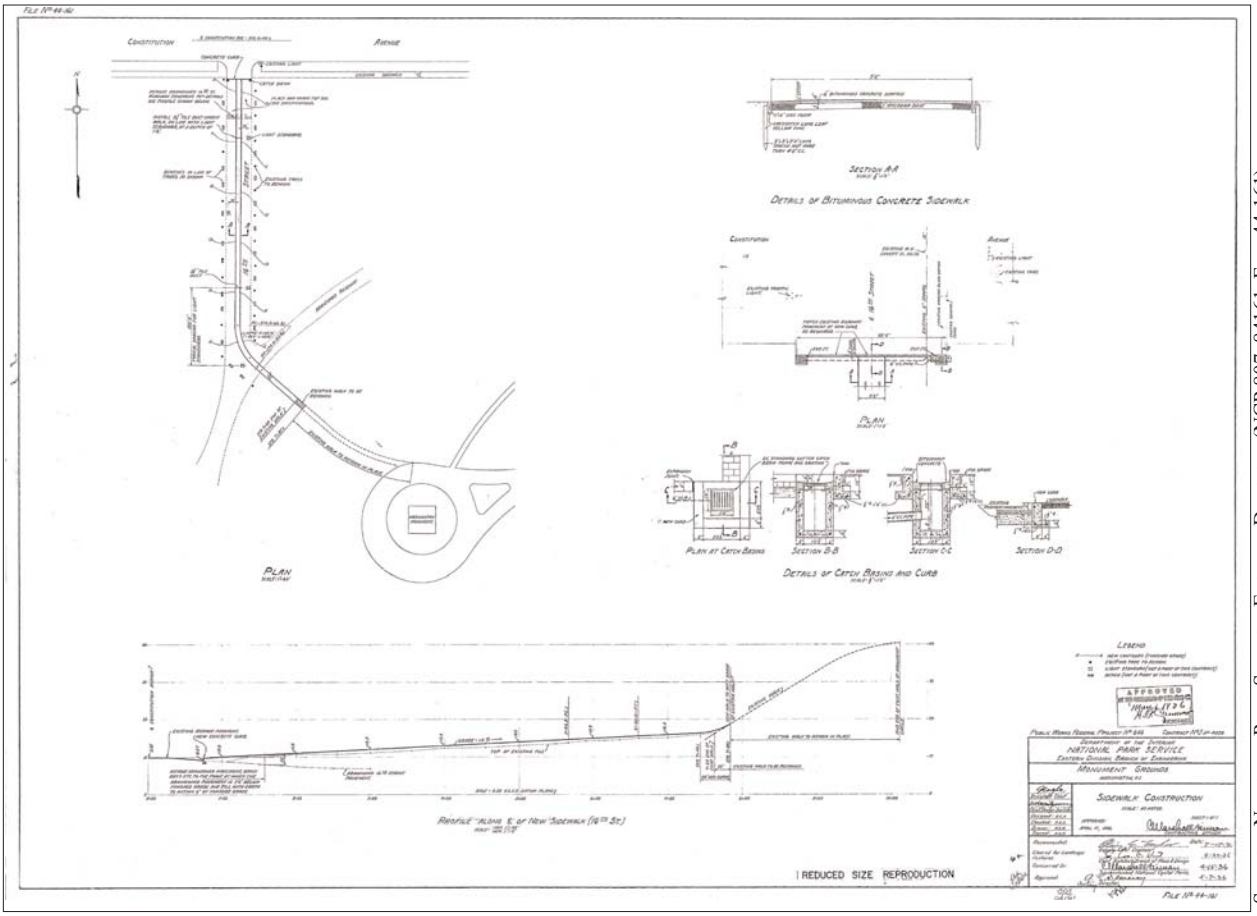
SOURCE: HISTORICAL SOCIETY OF WASHINGTON, D.C., 1776

Figure 2-51. 1934 view of the monument encased in scaffolding.



SOURCE: NCP, FILE 807_84158, PAGE 1

Figure 2-52. 1936 plan for removing many roads from Monument Grounds. Only 15th S treet, part of the road around the Survey Lodge, Madison Drive, Jefferson Drive and the road to the monument from 15th Street were to remain.



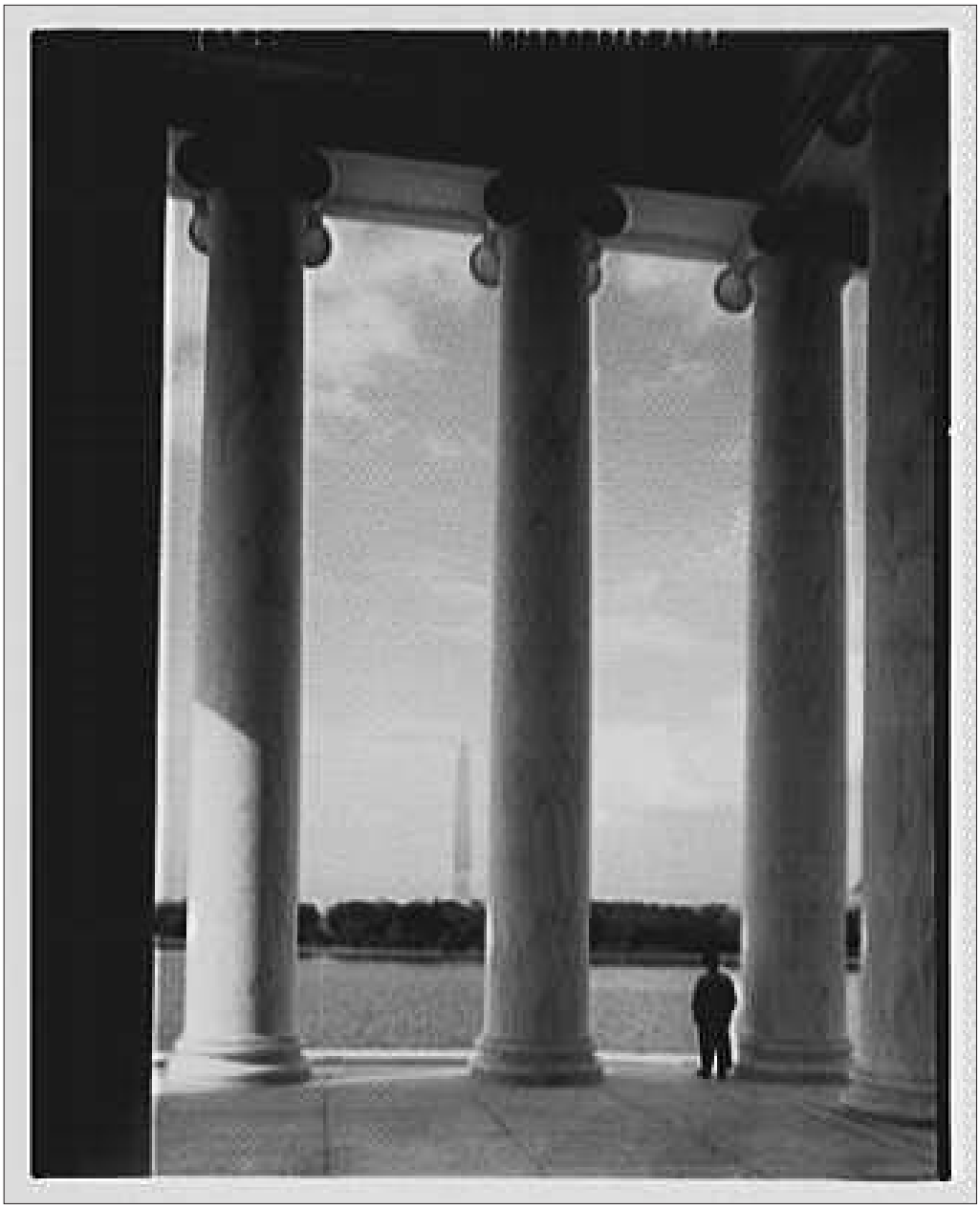
SOURCE: NATIONAL PARK SERVICE, EASTERN DIVISION, (NCP 807_84161, FILE 44-161)

Figure 2-53. 1936 plan for removing 16th St.



SOURCE: LIBRARY OF CONGRESS (CALL #LC-USF33-015611-M1)

Figure 2-54. 1939 street view near the Washington Monument.



SOURCE: LIBRARY OF CONGRESS (CALL # LC-G613-42833)

Figure 2-55. 1941 view of monument from the Jefferson Memorial.

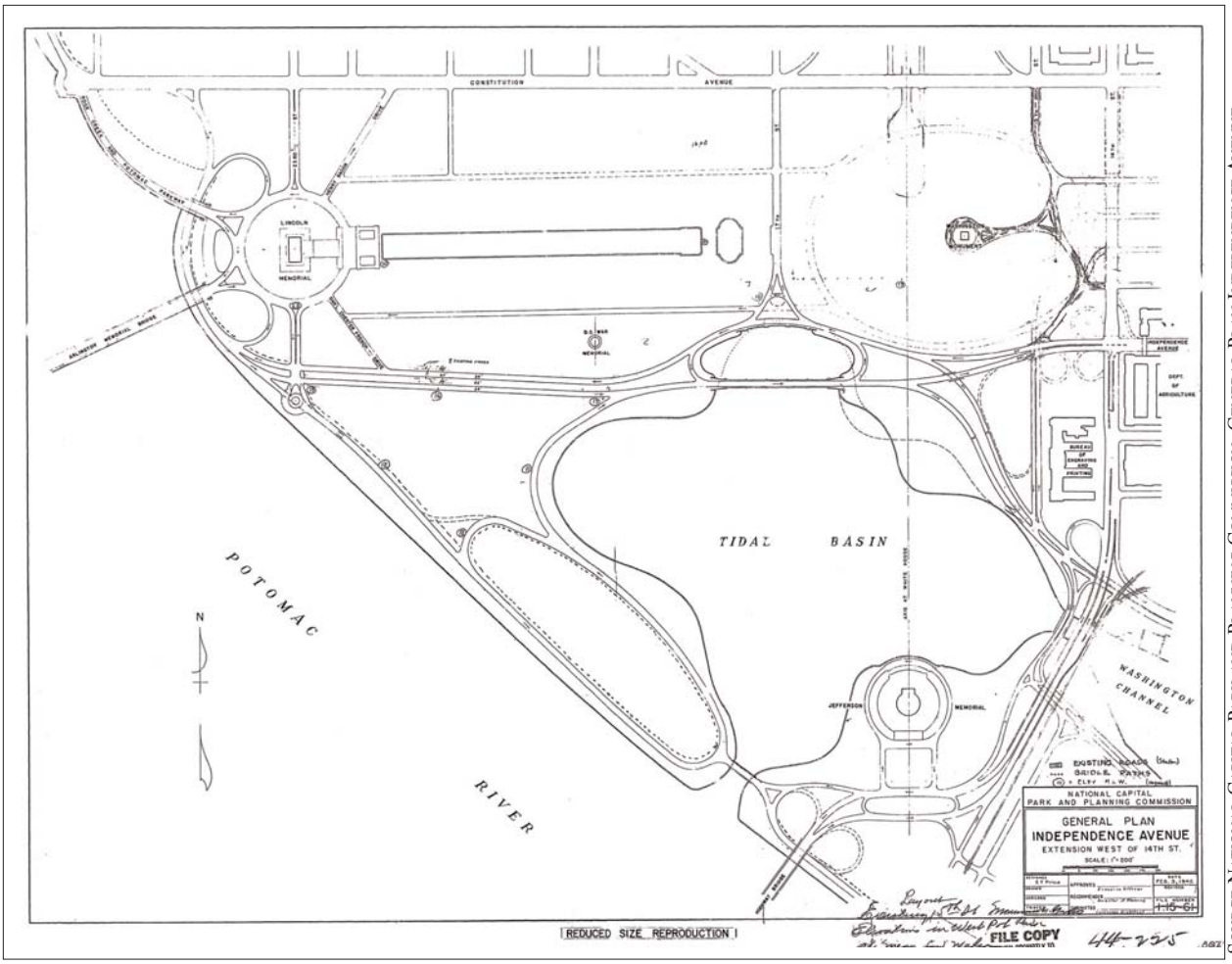
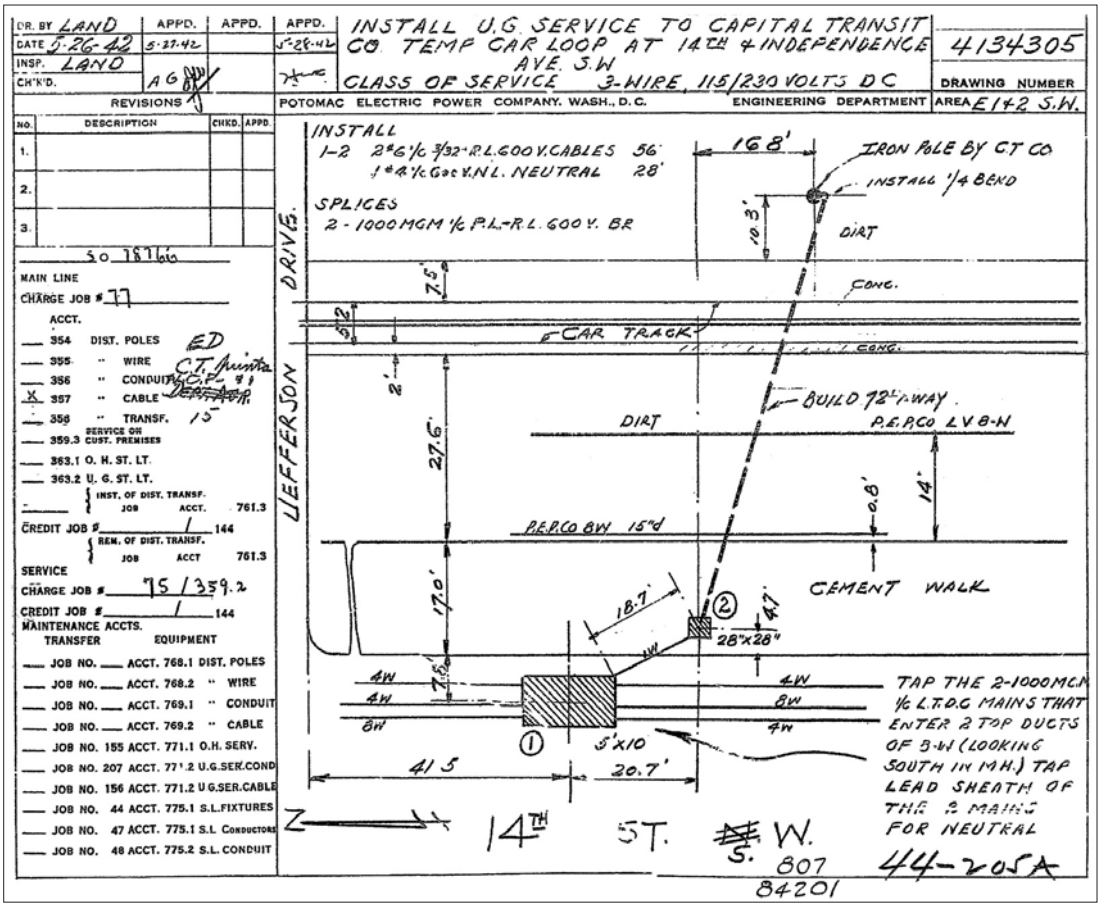


Figure 2-56. 1942 plan for plan for highway system around the Monument Grounds.

SOURCE: NATIONAL CAPITAL PARK AND PLANNING COMMISSION, GENERAL PLAN INDEPENDENCE AVENUE, EXTENSION WEST OF 14TH ST., FEBRUARY 3, 1942 (NCP 807_84225, FILE 44-225)



SOURCE: TEMP. FED. OFFICE BLDGS. T3, T4, & T5, FEDERAL WORKS AGENCY, MAY 20, 1942 (NCP 807_84201, FILE 44-201)

Figure 2-57. 1942 plan for temporary federal office buildings.



SOURCE: LIBRARY OF CONGRESS (CALL # FSA1998022880/PP)

Figure 2-58. 1942 photograph of construction materials.



SOURCE: LIBRARY OF CONGRESS (CALL # LC-USF34-011451-D [P&P])

Figure 2-59. 1942 view from observation deck of temporary building construction area.



SOURCE: LIBRARY OF CONGRESS (CALL # FSA1998022854/PP)

Figure 2-60. 1942 construction of temporary war buildings.



SOURCE: LIBRARY OF CONGRESS (CALL # LC-USF34-011492-D [P&P])

Figure 2-61. 1942 photograph of visitors waiting in line at the monument plaza.



SOURCE: LIBRARY OF CONGRESS (CALL # LC-USF34-011491-D [P&P])

Figure 2-62. 1942 photograph of Red Cross volunteers visiting the Washington Monument



SOURCE: LIBRARY OF CONGRESS (CALL # LC-USF34-011506-D [P&P])

Figure 2-63. 1942 photograph of sign, benches, and monument plaza



SOURCE: LIBRARY OF CONGRESS (CALL # LC-USF34-100289-D [P&P])

Figure 2-64. 1942 photograph of a baseball game on the Monument Grounds.



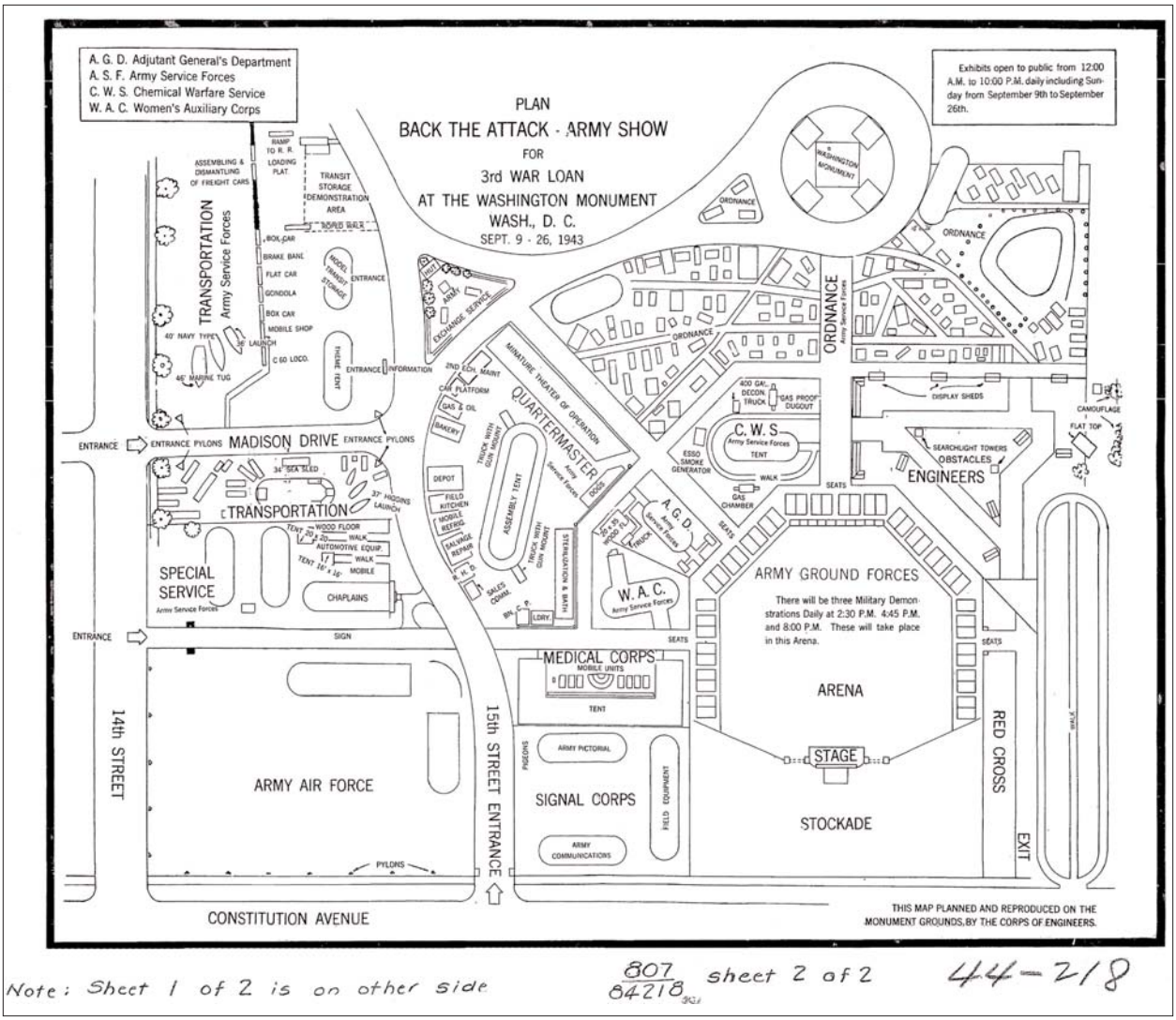
SOURCE: LIBRARY OF CONGRESS (CALL # LC-USF34-100644-E [P&P])

Figure 2-65. 1942 photograph of government workers lunching on the grounds.



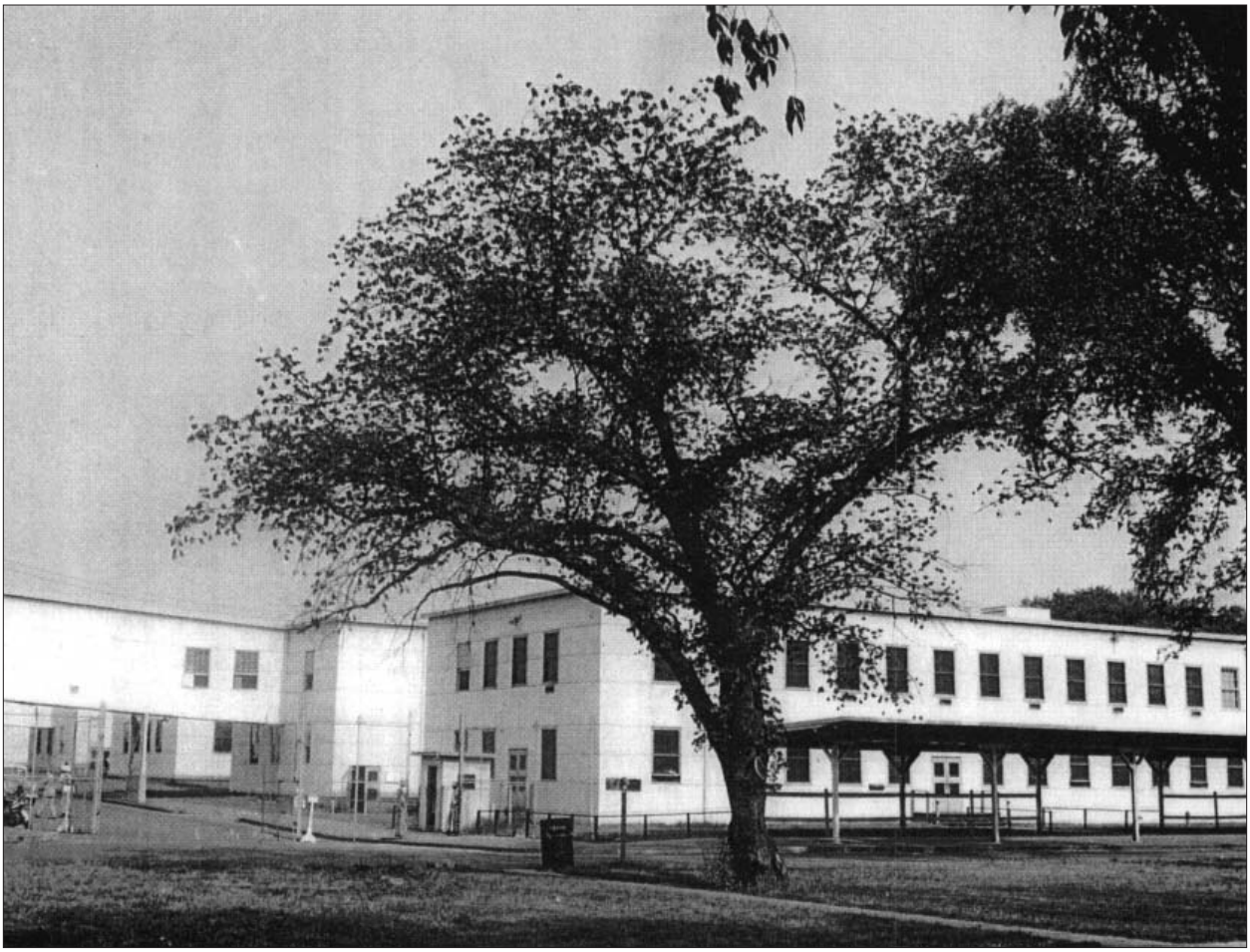
SOURCE: LIBRARY OF CONGRESS (CALL # LC-USF34-100617-D [P&P])

Figure 2-66. 1942 photograph of government workers lunching on the grounds.



SOURCE: PLAN BACK THE ATTACK - ARMY SHOW, SEPTEMBER 1943 (NCP 807_84218, FILE 44-218)

Figure 2-67. 1943 plan for "Back the Attack -3rd War Loan" bond rally.



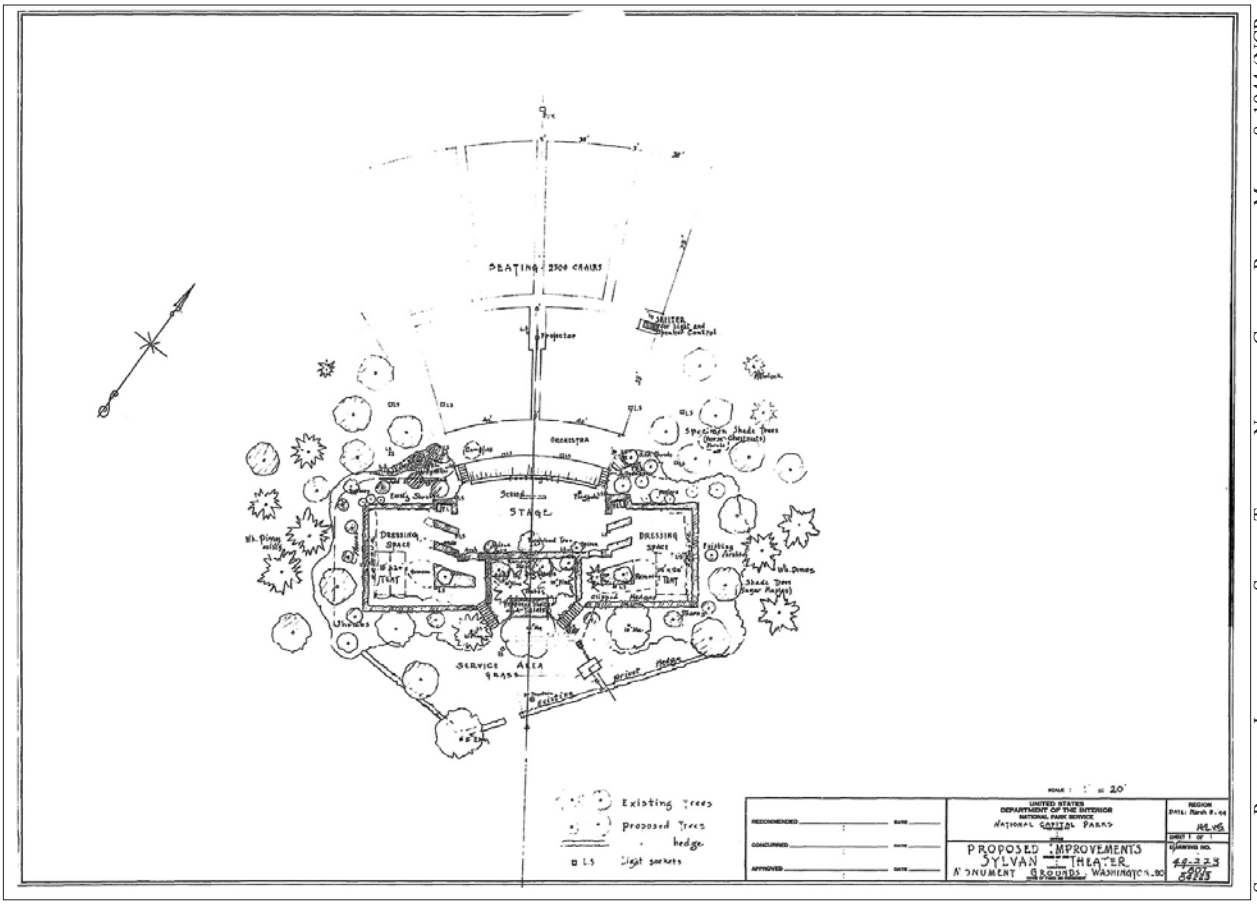
SOURCE: NPS - NCP CENTRAL, LORI MCCONNELL FILES

Figure 2-68.1944 photograph of temporary building on the Monument Grounds.



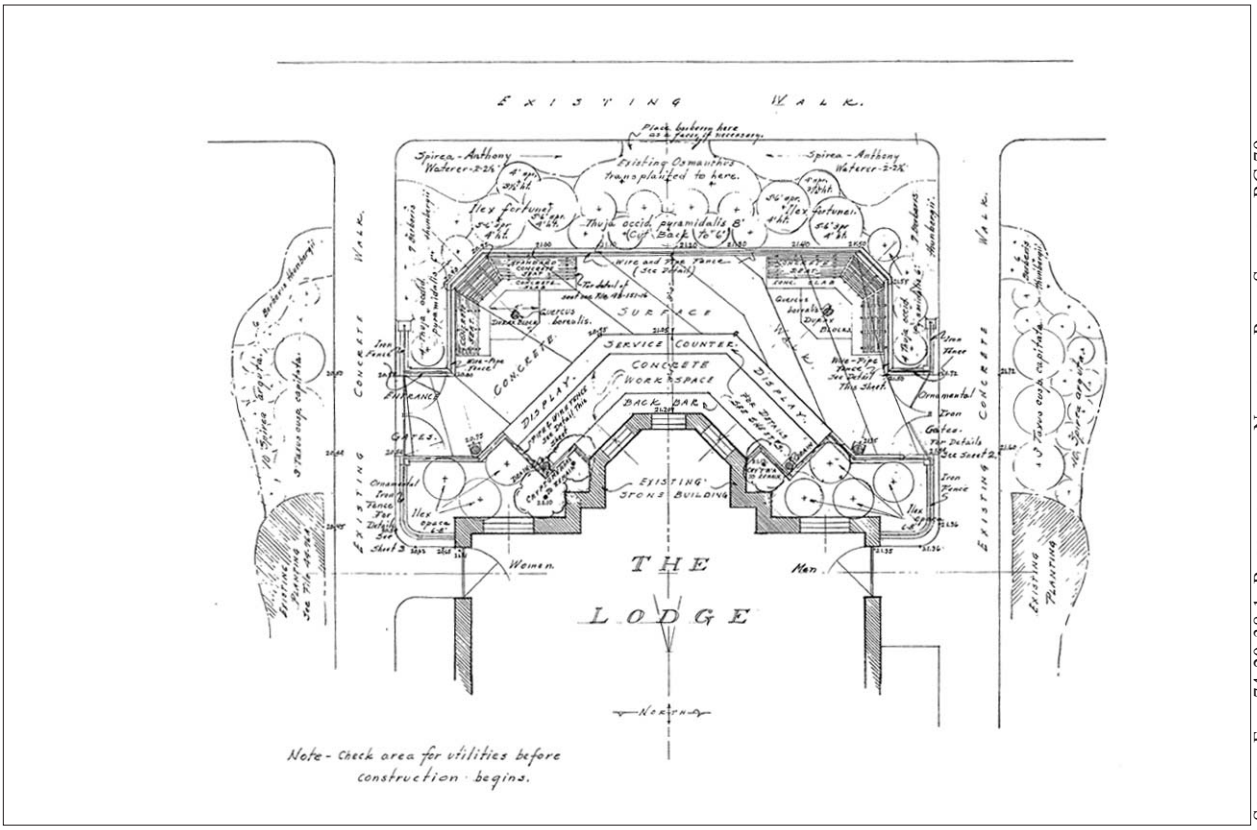
SOURCE: LIBRARY OF CONGRESS, LOT 4719

Figure 2-69. 1944 Fourth of July celebration.



SOURCE: PROPOSED IMPROVEMENTS SYLVAN THEATRE, NATIONAL CAPITAL PARKS, MARCH 8, 1944 (NCP 807_84223, FILE 44-223)

Figure 2-70. 1944 plan for improvements to the Sylvan Theatre.



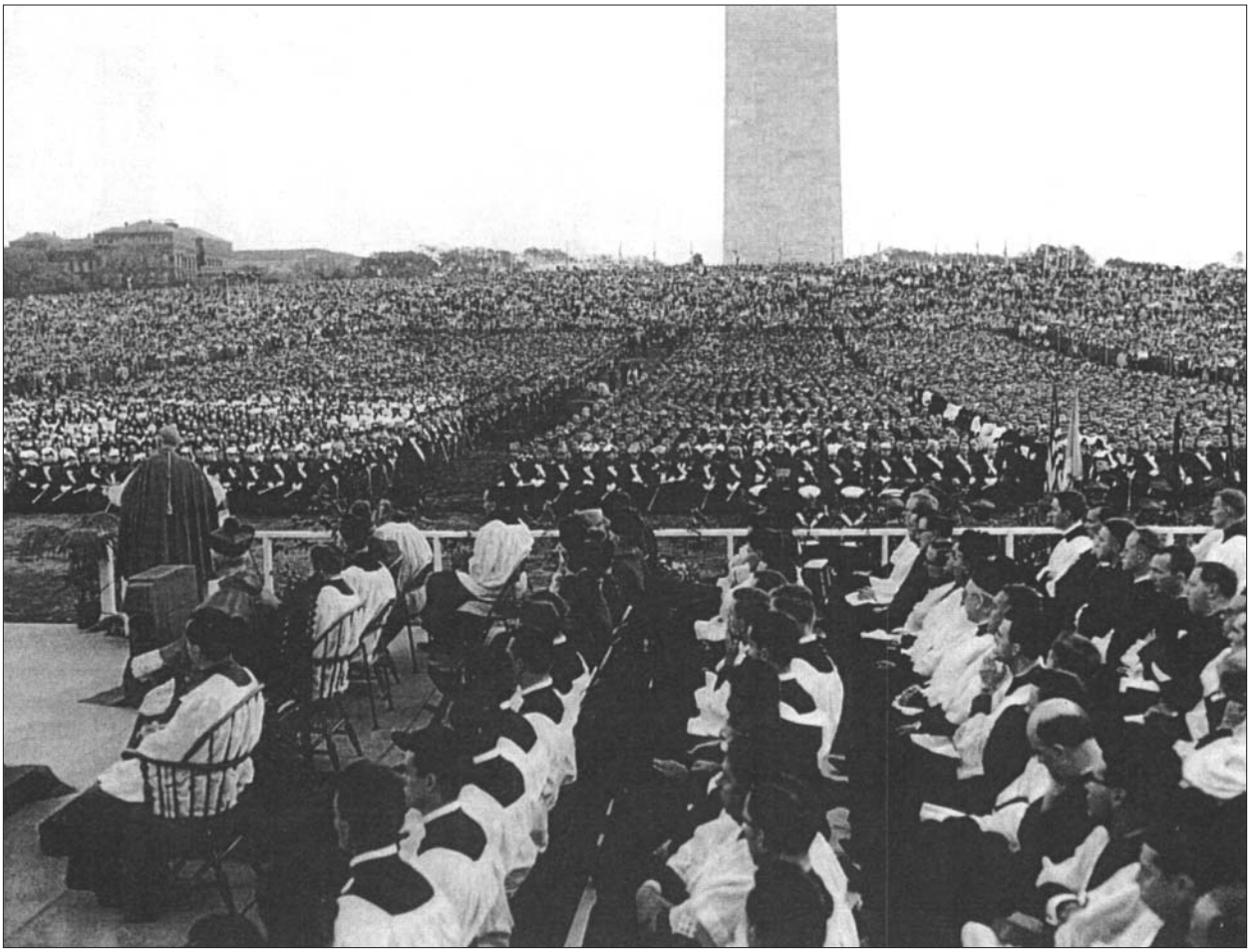
SOURCE: FILE 74-20-38-1, RECORDS OF THE NATIONAL PARK SERVICE, RG 79, CARTOGRAPHIC AND ARCHITECTURAL RECORDS LICON, SPECIAL MEDIA ARCHIVES SERVICES DIVISION, COLLEGE PARK, MD

Figure 2-71. 1948 plan for concession addition and plantings at the Monument Lodge, detail.



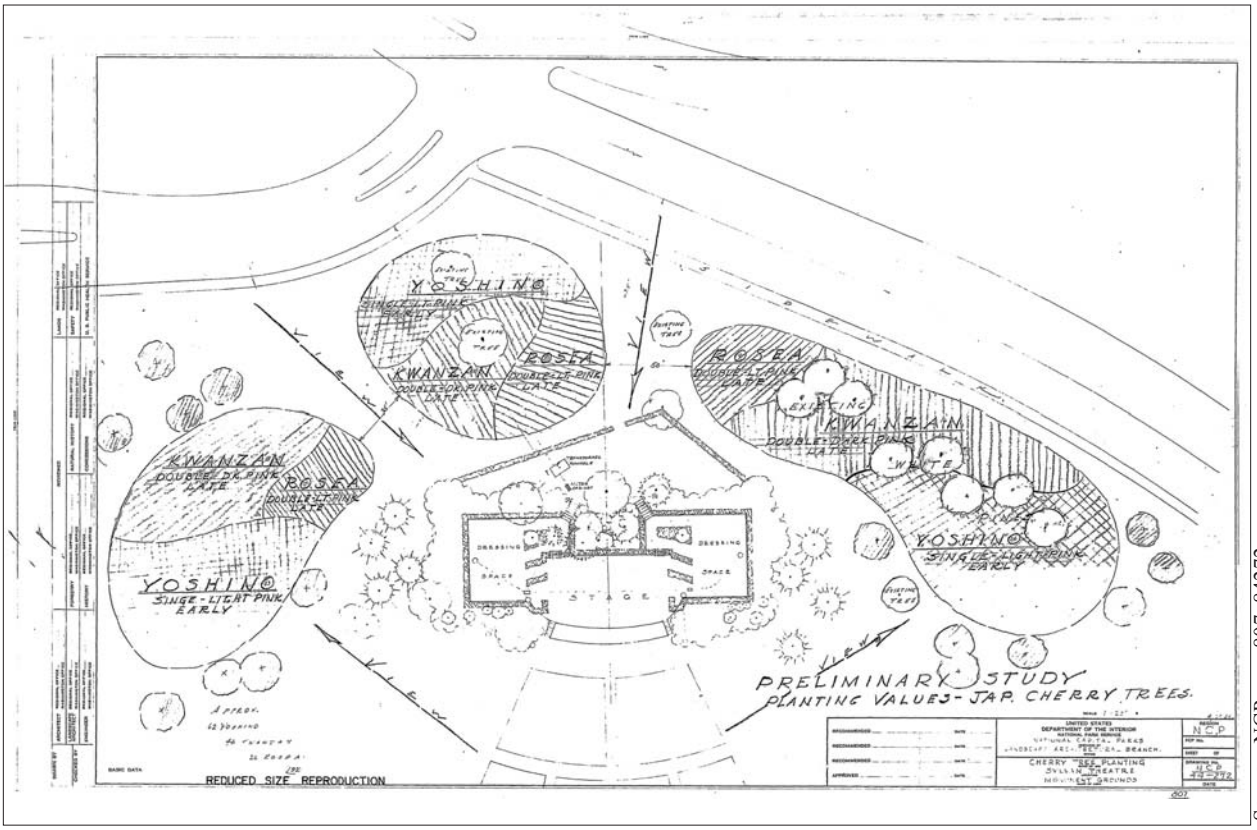
SOURCE: WASHINGTONIANA DIVISION (8031), MARTIN LUTHER KING, JR. MEMORIAL LIBRARY, WASHINGTON, D.C.

Figure 2-72. 1949 photograph looking east toward the monument. Note temporary buildings in the northwestern portion of the Monument Grounds and north and south of the Reflecting Pool.



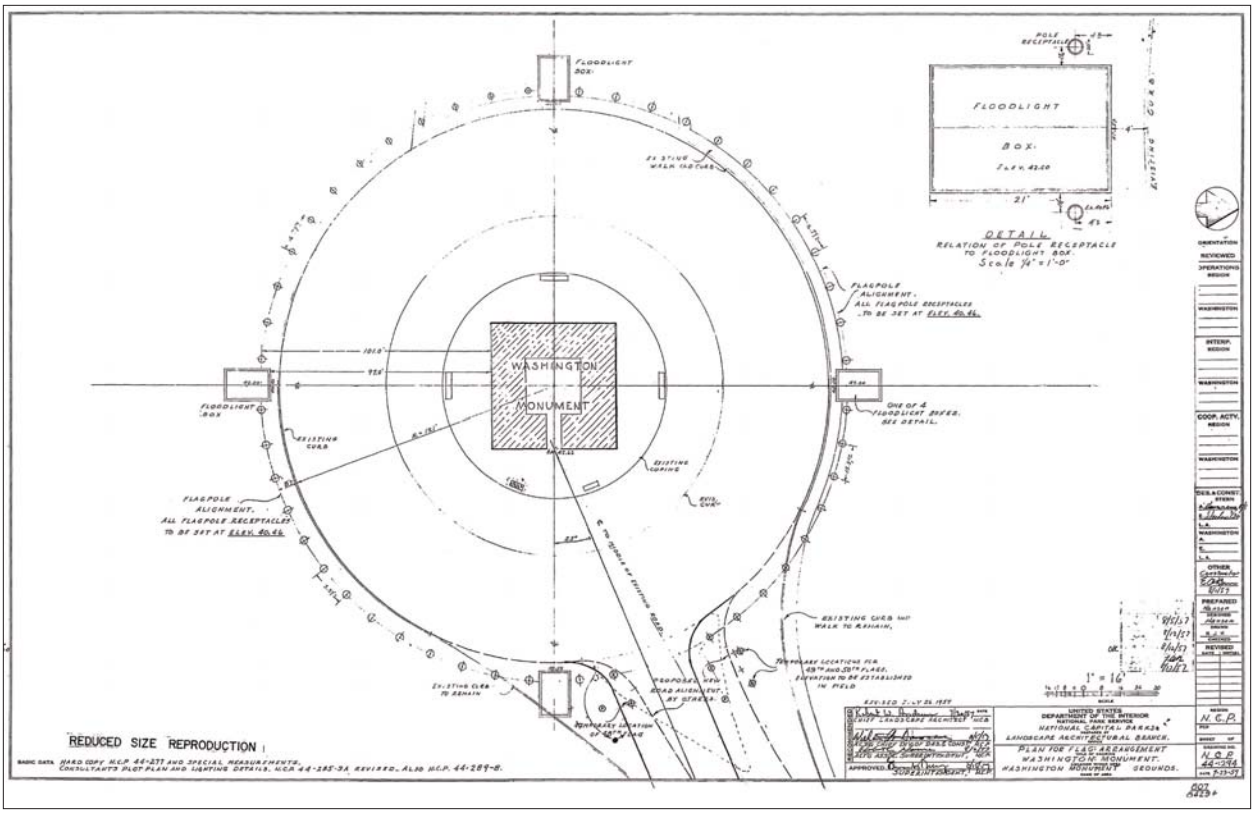
SOURCE: ABBIE ROWE, NPS, 2796-I

Figure 2-73. 1954 photograph of Catholic mass held as part of the Marian Year Celebrations.



SOURCE: NCP, FILE 807_84272

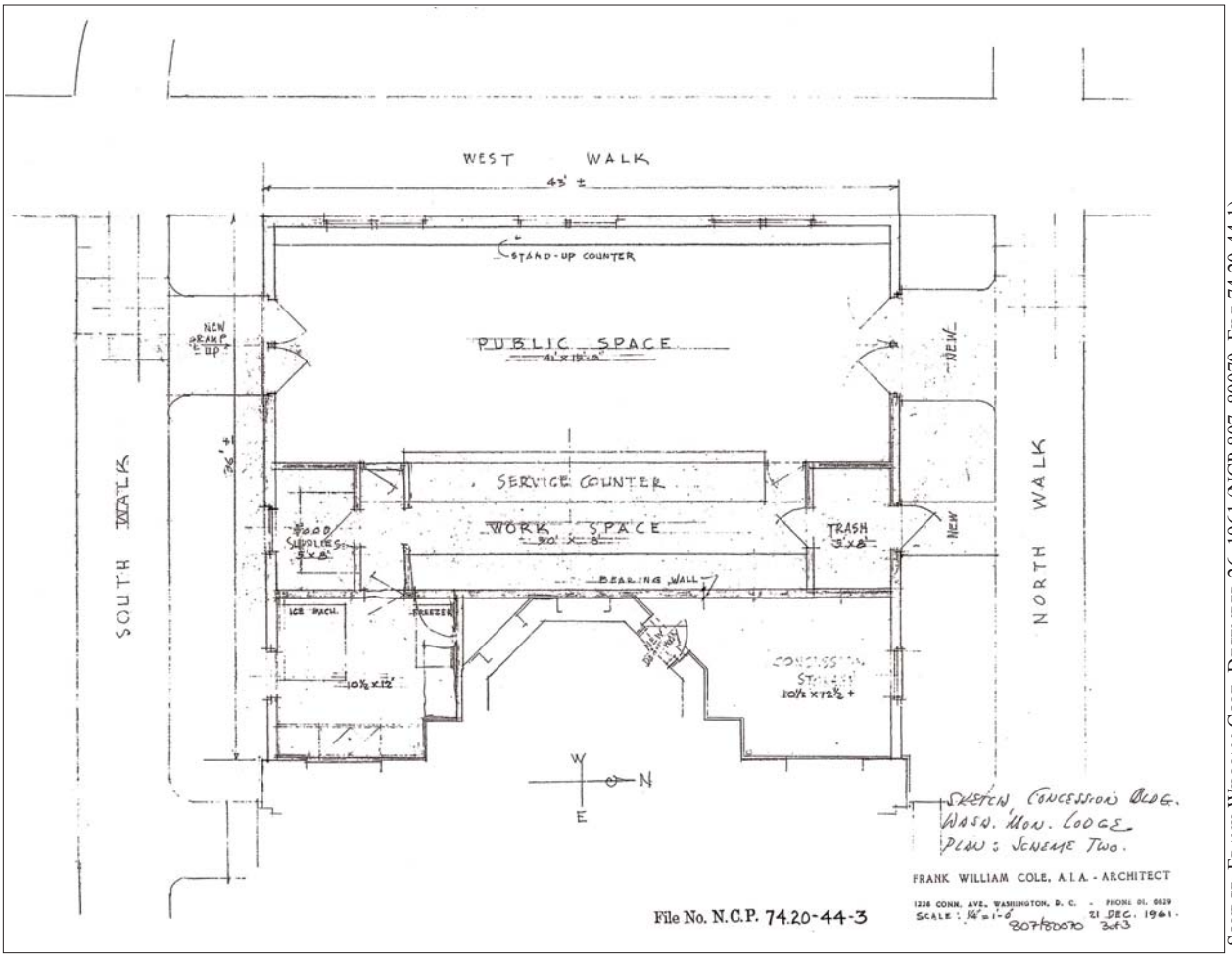
Figure 2-74. 1954 site plan showing locations of cherry trees added to Sylvan Theatre. Note that when planted, the tree locations marked Kwanzan and Rosea on the plan were actually planted with Yoshino.



SOURCE: NATIONAL CAPITAL PARKS, PLAN FOR FLAG ARRANGEMENT, JULY 23, 1957 (NCP 807_84294, FILE 44-294)

Figure 2-75. 1957 plan for permanent flagpoles ringing Washington Monument.

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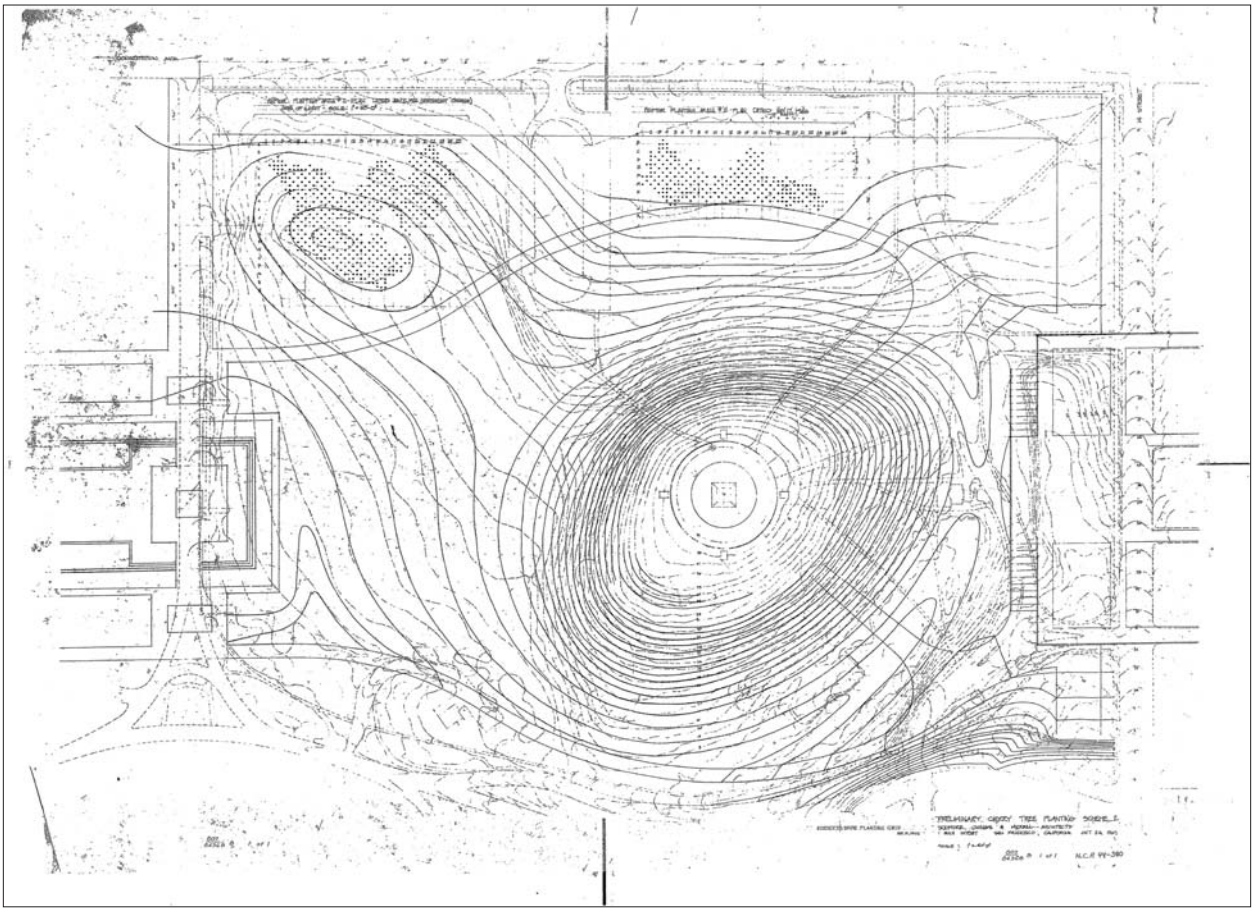
SOURCE: FRANK WILLIAM COLE, DECEMBER 26, 1961 (NCP 807_80070, FILE 74.20-44-1)

Figure 2-76. 1961 design for the addition to the Monument Lodge.



SOURCE: ALLEN, *THE WASHINGTON MONUMENT, IT STANDS FOR ALL*, PAGE 149

Figure 2-77. 1963 photograph of Martin Luther King, Jr., with the Washington Monument.



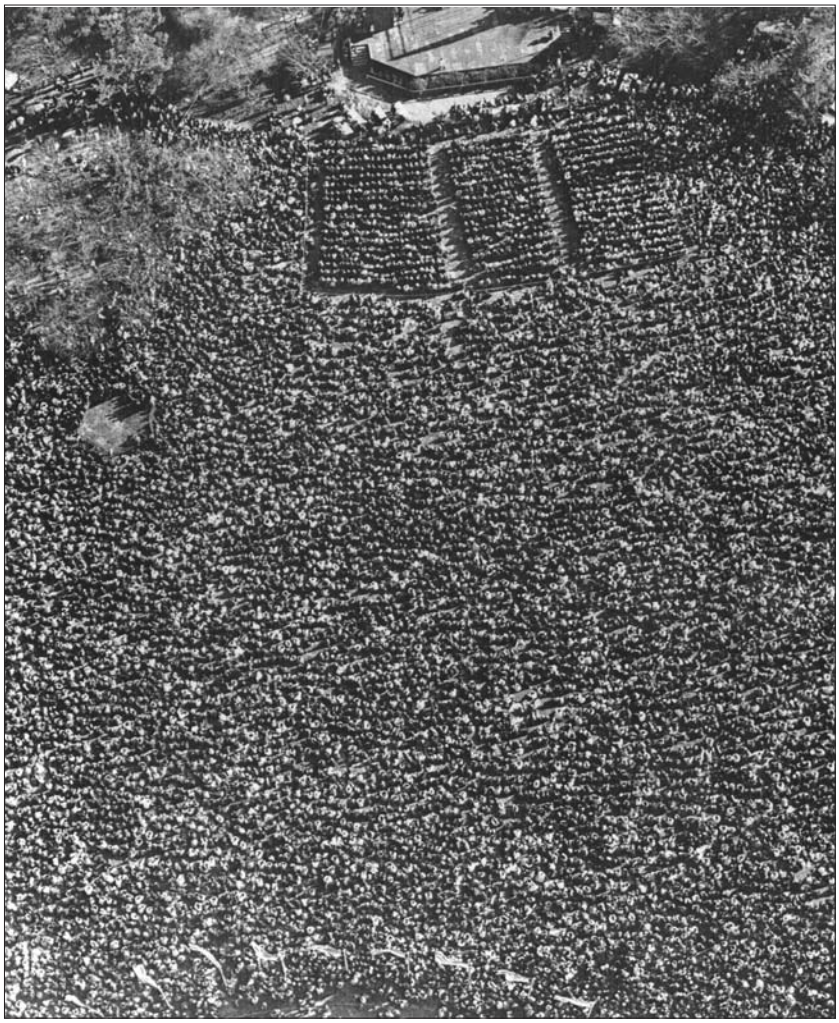
SOURCE: NCP, FILE 807_84368 B

Figure 2-78. 1966 plan for two groves of cherry trees on the Monument Grounds.



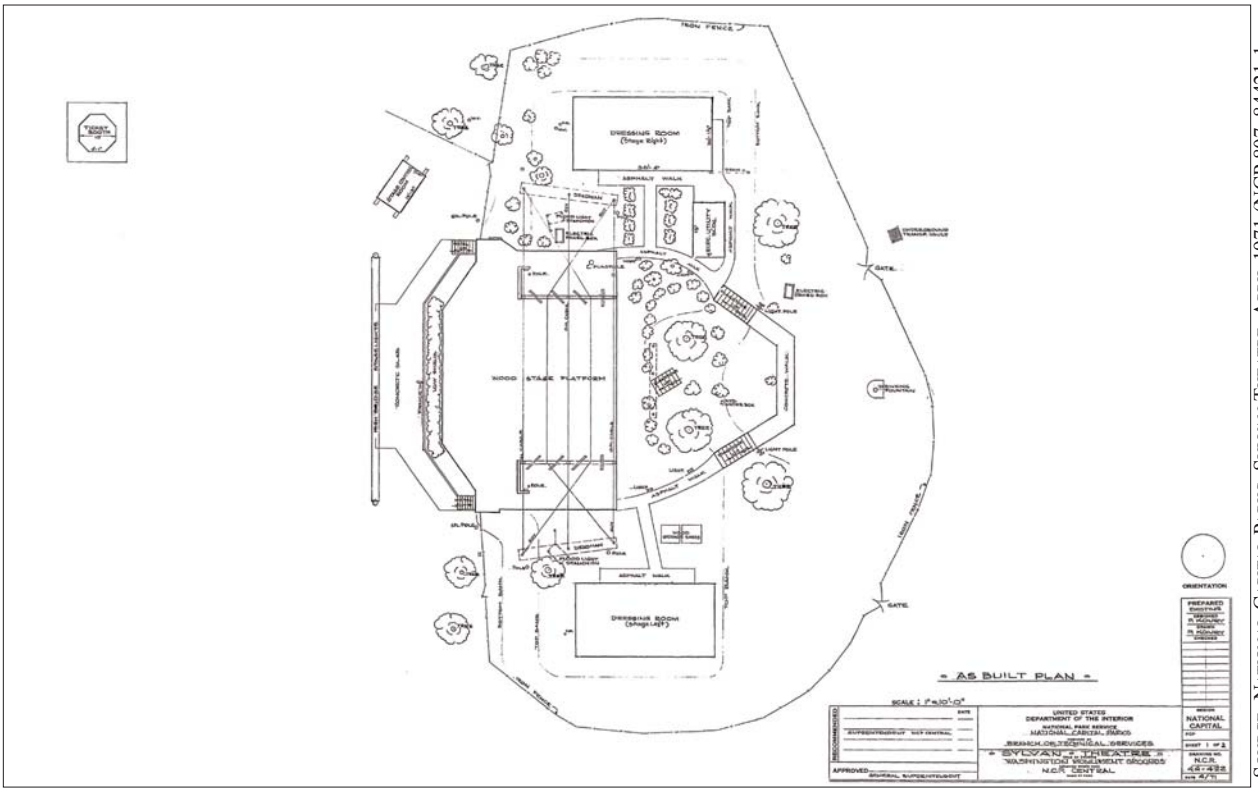
SOURCE: PICKETING FILE (154633), WASHINGTONIANA DIVISION, MARTIN LUTHER KING, JR. MEMORIAL LIBRARY, WASHINGTON, D.C.

Figure 2-79. 1969 photograph of the crowd at an anti-war march Monument Grounds.



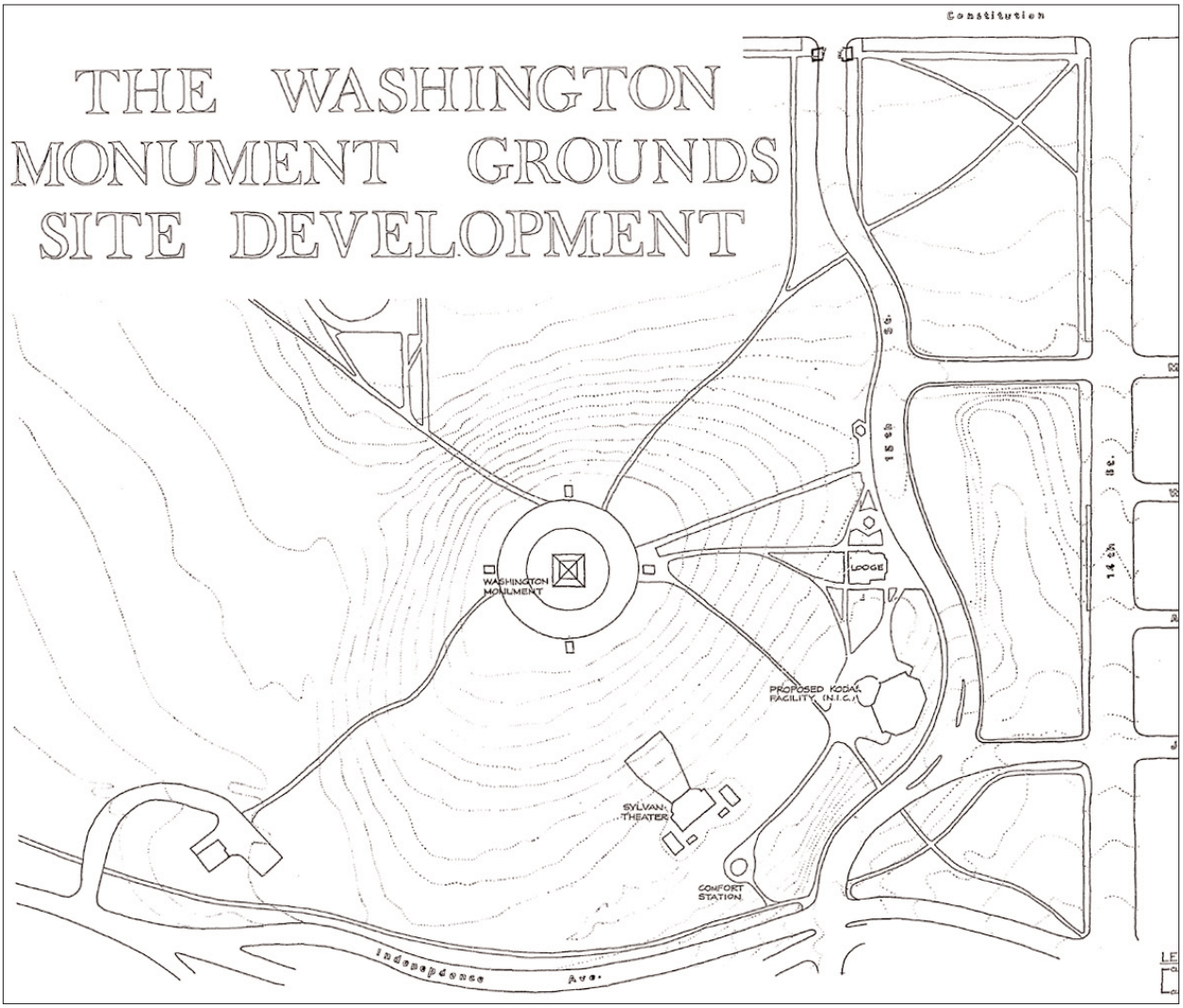
SOURCE: WASHINGTONIANA DIVISION (6185), MARTIN LUTHER KING, JR. MEMORIAL LIBRARY, WASHINGTON, D.C.

Figure 2-80. 1960s view of protesting crowds at Sylvan Theatre and the Monument Grounds. This view is of an estimated 250,000 demonstrators.



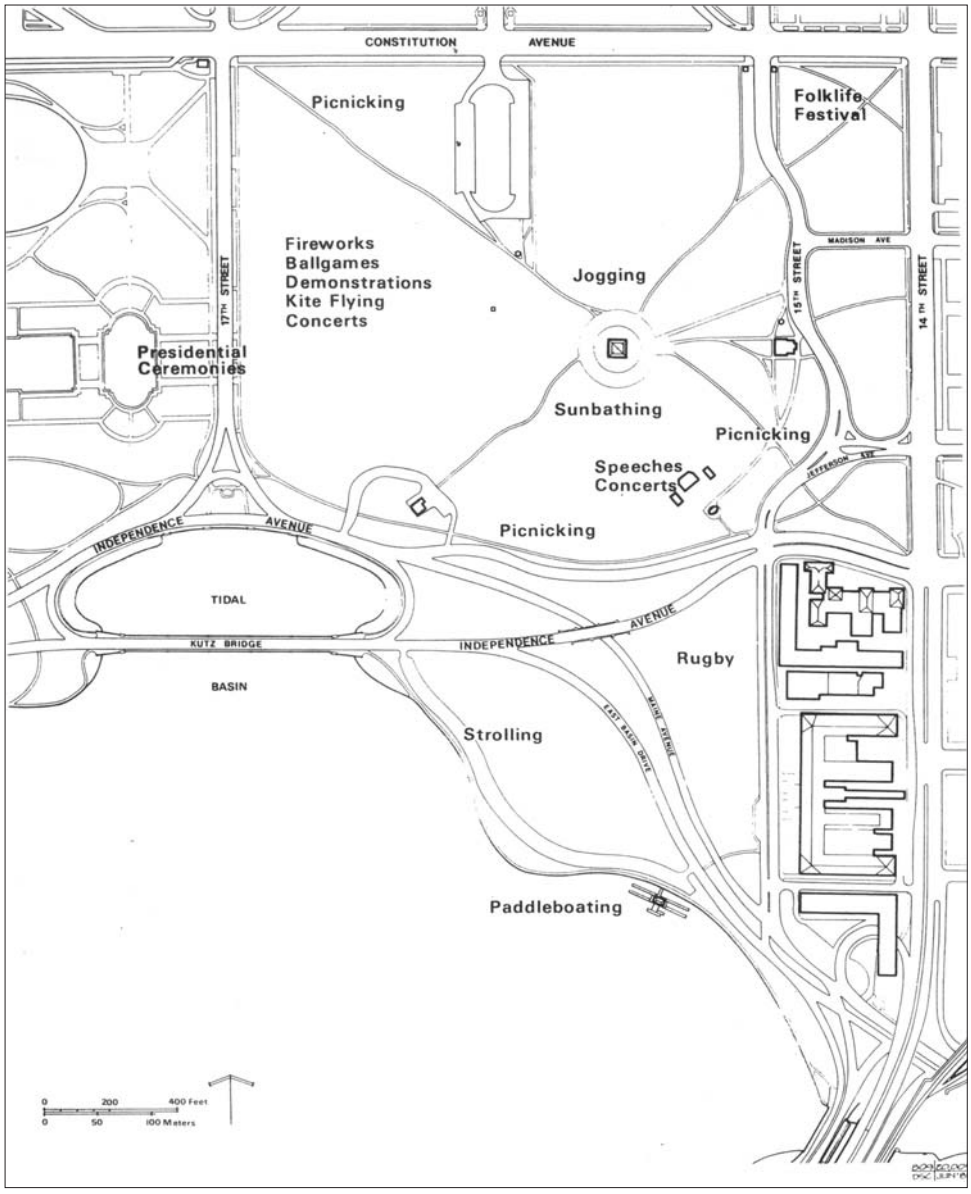
SOURCE: NATIONAL CAPITAL PARKS, SYLVAN THEATRE, APRIL 1971 (NCP 807_84421-1, FILE 44-422)

Figure 2-81. 1971 as-built plan for Sylvan Theatre improvements. The plan includes permanent dressing rooms, proscenium, and enlarged stage platform.



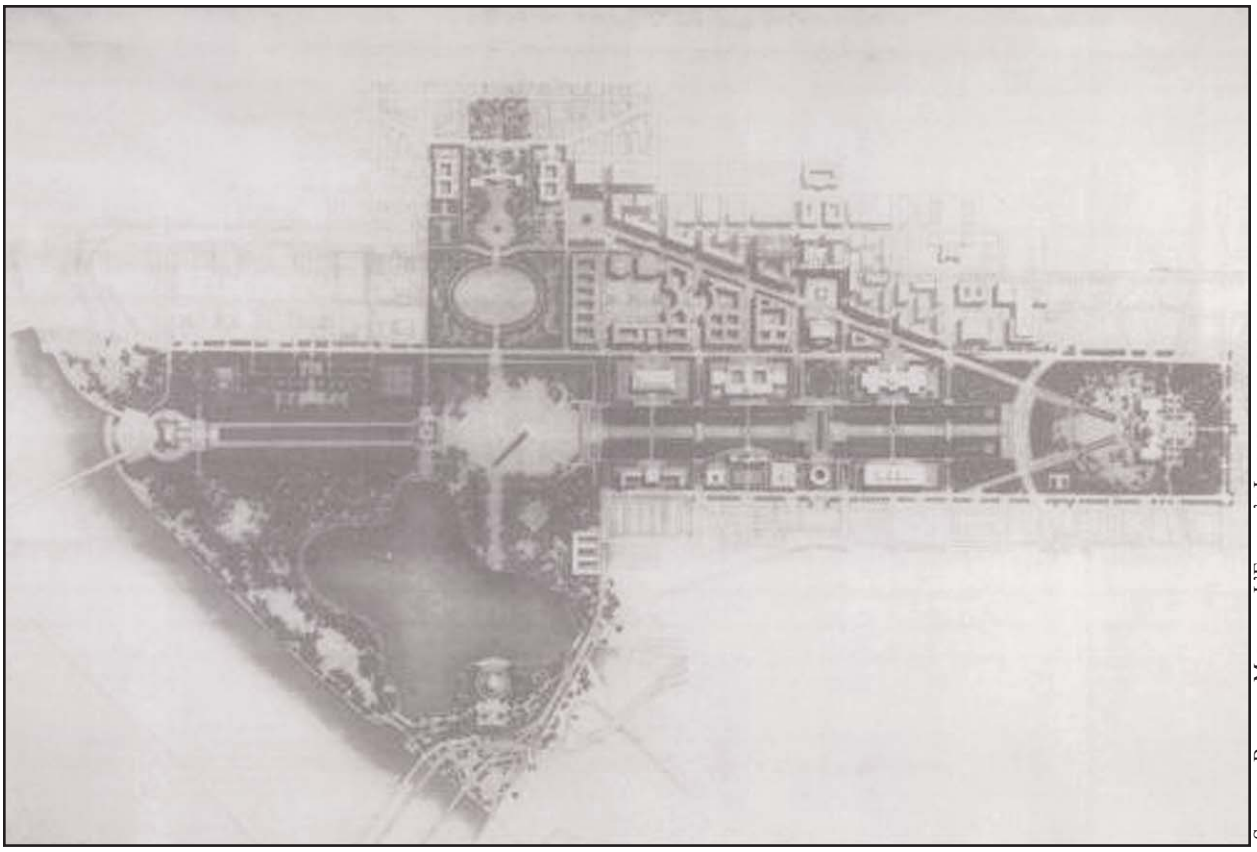
SOURCE: SOM, WASHINGTON MONUMENT GROUNDS SITE DEVELOPMENT, SEPTEMBER 1975 (NCP 807_84440A, 1 OF 3)

Figure 2-82. 1975 site plan improvements for the Bicentennial,detail. Note the temporary Kodak Theatre northeast of the Sylvan Theatre and a comfort station south of the Sylvan Theatre.



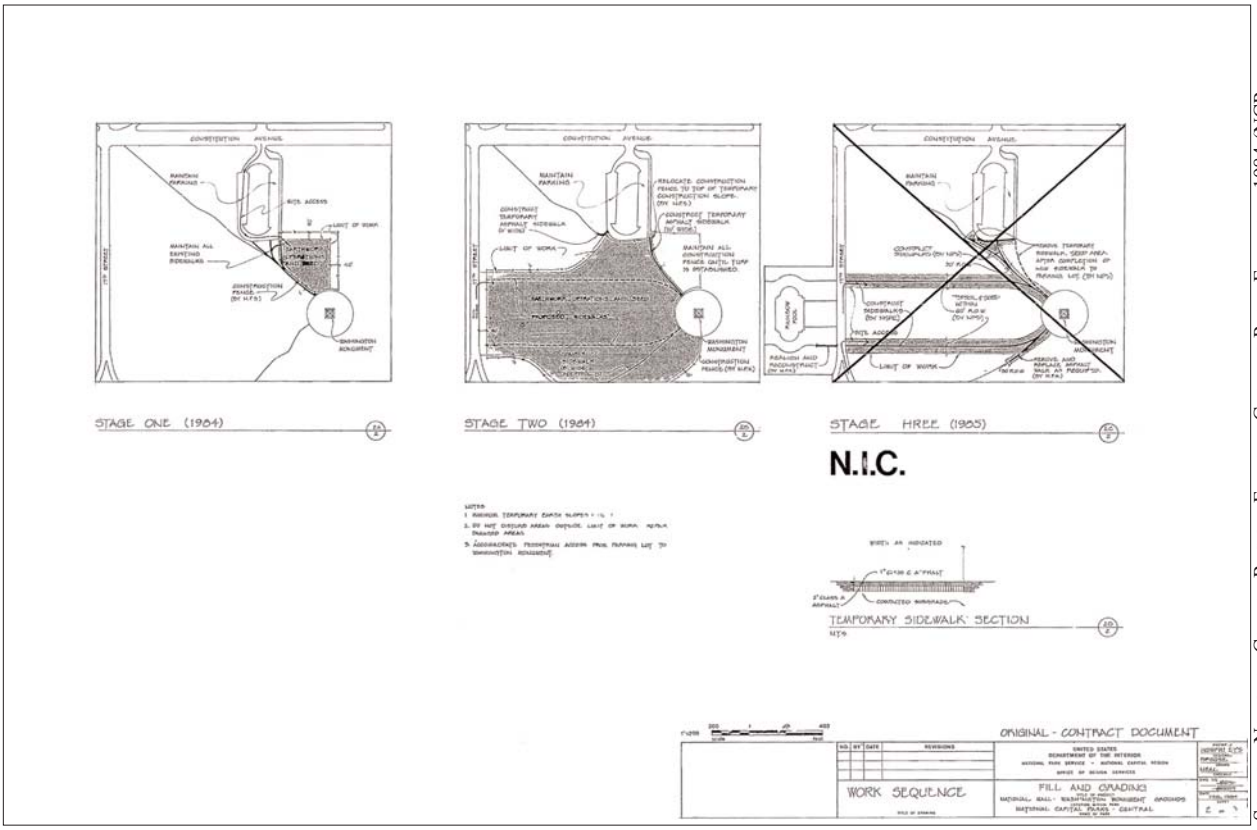
SOURCE: NATIONAL CAPITAL PARKS-CENTRAL, DEVELOPMENT CONCEPT PLAN AND ALTERNATIVES, SEPTEMBER 1981, UNPUBLISHED REPORT, 20

Figure 2-83. 1981 development concept plan visitor usage map.



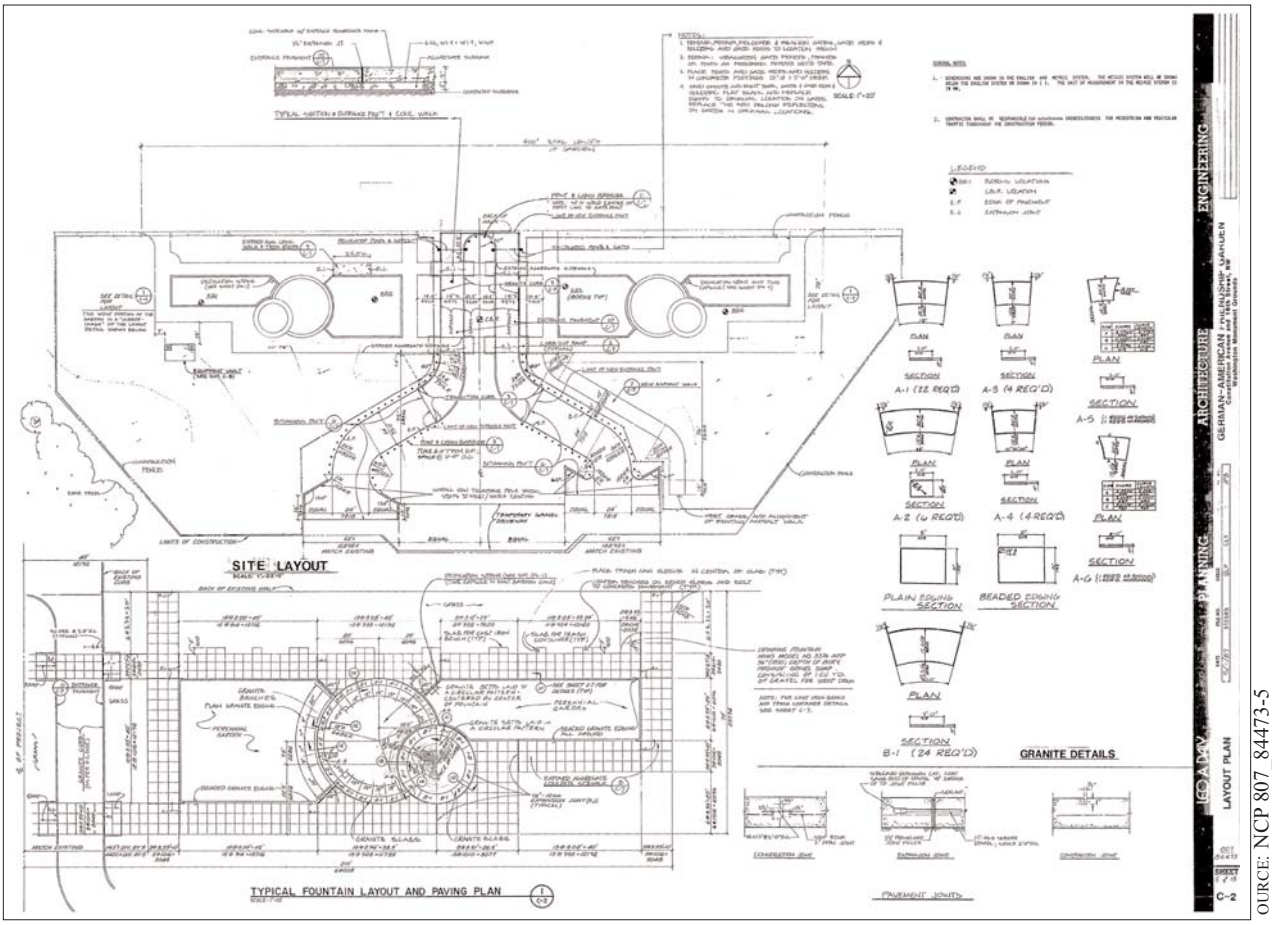
SOURCE: BEDNAR, MICHAEL. L'ENFANT'S LEGACY: PUBLIC OPEN SPACES IN WASHINGTON, D.C. (BALTIMLRE: JOHNS HOPKINS, 2006), 57.

Figure 2-84. 1965 Mall Master Plan, by Skidmore, Owings, and Merrill.



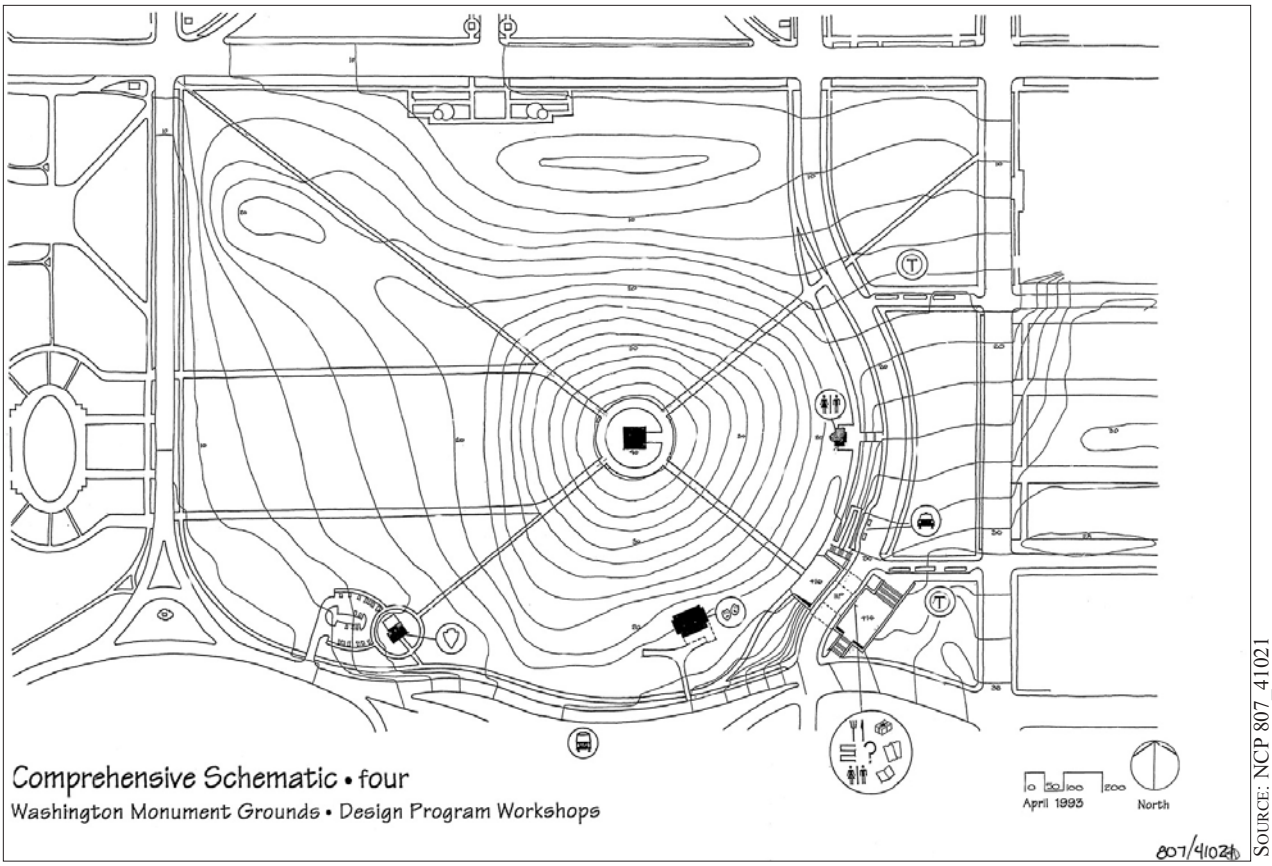
SOURCE: NATIONAL CAPITAL REGION, FILL AND GRADING PLAN, FEBRUARY 1984 (NCP 807_84457-2)

Figure 2-85. 1984 site plan for walkway improvements.



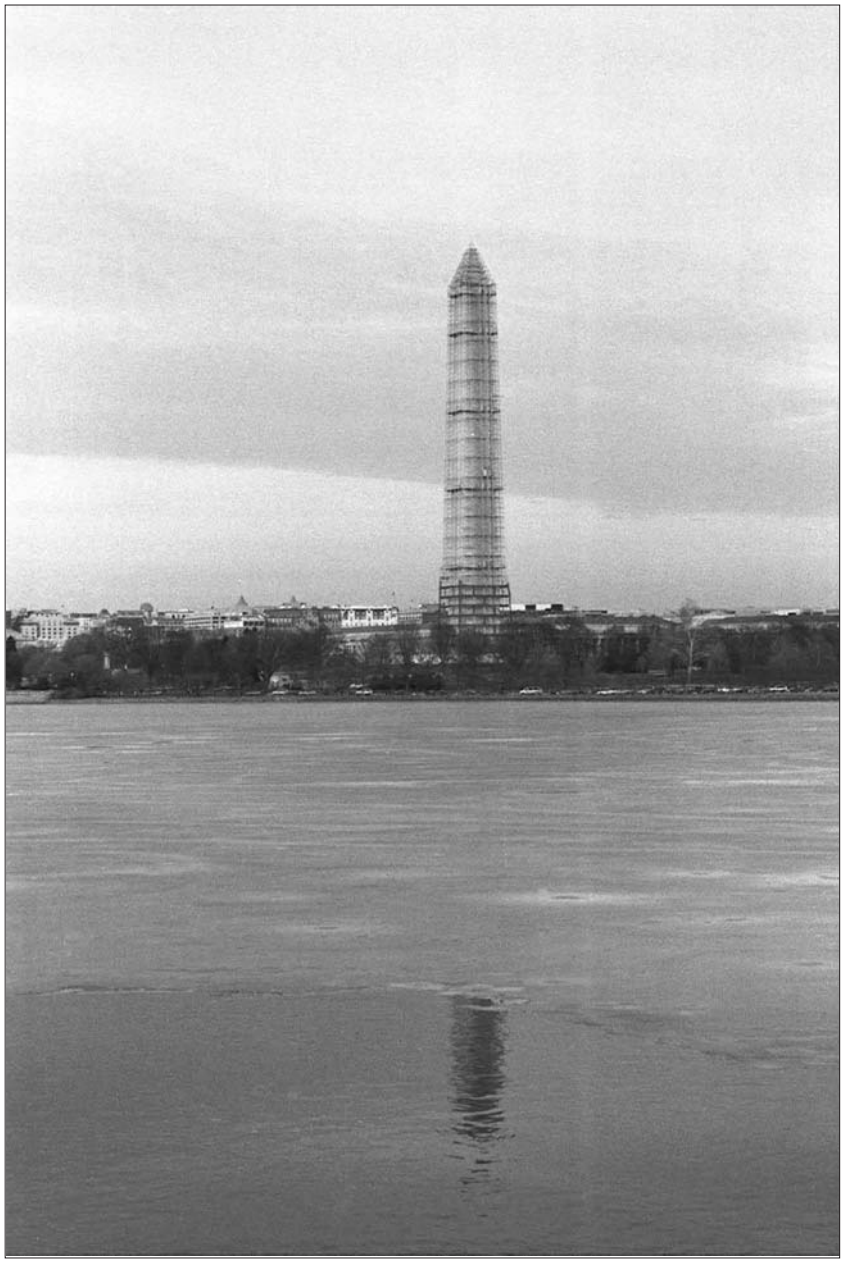
SOURCE: NCP 807_84473-5

Figure 2-86. plan for the German-American Friendship Garden.



SOURCE: NCP 807_41021

Figure 2-87. 1993 proposed modifications to the 1989 development concept plan. Note the realignment of 15th St., Jefferson and Madison Drives, new paths leading from the monument to the boundaries of the grounds and the use of Monument Lodge as entry for an under ground visitor center.



SOURCE: NATIONAL PARK SERVICE, NATIONAL CAPITAL REGION, HISTORIC ARCHITECTURE PROGRAM (WASHINGTON MONUMENT, ROCR 42-19)

Figure 2-88. 1999 photograph of the Washington Monument encased in scaffolding.



SOURCE:

Figure 2-89. 2002 Development Concept Plan for the Monument Grounds, Olin Partnership

Chapter Three

Existing Conditions

CHAPTER THREE

EXISTING CONDITIONS

INTRODUCTION

This chapter includes written, graphic, and photographic documentation of the Washington Monument Grounds as of spring 2003.[1] This existing landscape conditions documentation is based primarily upon field investigations of the project area and information provided about the site by the National Park Service (NPS). The chapter is organized into four sections:

- Environmental Context and Setting
- Cultural Context and Setting
- Study Boundary
- Landscape Documentation by Landscape Characteristic

The first two sections provide an overview understanding of the context for the Washington Monument Grounds and the detailed descriptions of existing landscape features, systems, and land-use patterns that follow. Descriptions of individual landscape features are organized into a series of landscape characteristics (corresponding inventory abbreviations are noted in parentheses):

- Natural Systems (N);
- Spatial Organization (SO);
- Land Use (L);
- Circulation (C);
- Topography (T);
- Vegetation (Ve);
- Buildings (B);
- Structures (S);
- Small-scale Features (SS);
- Views and Vistas (V); and
- Archeological Resources (A).

Included at the end of this chapter are maps and photographs that illustrate the documentation narrative, the existing conditions, the feature inventory, and photograph view information conveyed in the text.

[1] Visual evidence and a summary of existing conditions as of August, 2011, is included in the Executive Summary.

ENVIRONMENTAL CONTEXT AND SETTING

The Washington Monument Grounds lie at the heart of the city of Washington, D.C. The region occupies the western edge of the Mid-Atlantic Coastal Plain, approximately fifty miles east of the Blue Ridge Mountains and thirty-five miles west of the Chesapeake Bay, along the Potomac and Anacostia Rivers. Elevations within the District of Columbia range from a few feet above sea level along the river banks to nearly 400 feet above sea level in the northwestern section of the city. Summers are warm and humid and winters are often cold, but not severe. Summertime high temperatures average in the mid-80s with lows in the upper 50s. Wintertime highs average in the mid 40s with lows in the upper 20s. Precipitation levels are relatively uniform throughout the year, with an average of forty inches annually. Average annual snowfall is eighteen inches. Thunderstorms can occur during the late spring and summer and often bring heavy downpours and gusting winds. Major flooding of the Potomac River can result from heavy rains, occasionally augmented by snowmelt and above-normal tides associated with severe storms along the coast. Flooding may also occur after a cold winter when the Potomac River is blocked with ice. These kinds of floods have been known to affect the Washington Monument Grounds project area.[1]

The development of the city of Washington, D.C., including the monument grounds, has involved various manipulations of the natural landform, topography, and hydrology of the site. Visible evidence of the tidal flats that once comprised much of the monument grounds has been erased through filling and the construction of seawalls. The topography of the Washington Monument Grounds has also been manipulated with fill.

The grounds lie within a densely-populated urban area. The surrounding pavements and structures contribute to the formation of a heat island, which can affect weather patterns. Development of the urban environment has also included channelization and culverting of streams and collection of stormwater into closed conveyance systems. Little evidence of the natural hydrologic processes formerly associated with the site exists today.

The site is also subject to noise, air, and light pollution as a result of its urban setting. There is little wildlife activity due to fragmentation of adjacent natural areas and the manicured character of the grounds, although the green nature of site serves as a refuge from the surrounding development for human residents and visitors alike.

CULTURAL CONTEXT AND SETTING

According to 2000 census data, the District of Columbia has a population of 536,000, and is at the center of a much larger metropolitan area.[2] The number of visitors to Washington, D.C., totaled more than 1.4 million in 2000.[3] Travel to the region is supported by Dulles International and Reagan Washington National Airports; Amtrak train services; and Interstates 95, 66, 295 and

395. Interstate 495 is a beltway that encircles the city. Visitors to Washington, D.C., are attracted to the large variety of sites and attractions offered by the nation's capital. There are museums for natural history, American history, science, and ancient and modern art. Memorials to war heroes, victims, and survivors; scientists and educators; religious leaders; mothers; explorers; and U.S. Presidents are scattered throughout the District. Washington, D.C., is the seat of the federal government, with landmarks representing its three branches: the executive branch at the White House, the legislative branch at the U.S. Capitol, and the judicial branch in the Supreme Court. The city is also the headquarters for many government agencies. The Washington Monument sits in the center of the National Mall, a ceremonial open space that serves as a foreground and connection route for many national monuments and memorials, and affords an opportunity for people to gather, celebrate, protest, and mourn.

STUDY BOUNDARY

For the purposes of this CLR, the project area is defined as the seventy-five-acre area which lies between the center lines of 17th Street, Constitution Avenue, 14th Street, and the westbound lanes of Independence Avenue. To the west of the site across 17th Street, the World War II Memorial is currently under construction and the Lincoln Memorial lies beyond. The Ellipse and the White House are situated north of the site across Constitution Avenue. To the east side of 14th Street, the National Mall stretches more than a mile to the Capitol. South of Independence Avenue is a wedge of land beyond which lies the Tidal Basin and the Jefferson Memorial.

LANDSCAPE CHARACTERISTICS

(map 3-1)

NATURAL SYSTEMS

Few natural features are currently evident within the Washington Monument Grounds. One of the natural systems that affects the form and function of the landscape is hydrology. Much of the water that falls on the site quickly disappears underground into constructed stormwater conveyance systems. There are, however, some poorly-drained areas that are often muddy due to ponding where compacted soils limit infiltration. Such areas are found south of the Monument Lodge and north and west of the monument *(figure 3-1)*. In some areas, there are drop inlets that convey stormwater to underground storm drains. Associated with stormwater is the potential of acid rain to damage the monument and other site structures.

There are several mature canopy trees scattered around the grounds. Site vegetation is primarily derived from planting programs. The only potentially naturally-occurring vegetation on the monument grounds is a group of mulberry (*Morus spp.*) trees southwest of the monument. Aging is of concern for the mature specimens, and disease is a concern for those prone to certain pathogens. American elm (*Ulmus americana*) trees have been used as a street tree and in groves

within public spaces in the city of Washington since the 19th century; many survive within the monument grounds. Surviving specimens must be constantly monitored and protected from Dutch elm disease. Other trees and shrubs around the site are subject to a variety of diseases, although none is as potentially problematic as the Dutch elm disease. Some of the plants around the Sylvan Theatre are considered invasive by the United States Department of Agriculture and the Commonwealth of Virginia. These include winter honeysuckle (*Lonicera fragrantissima*) and privet (*Ligustrum sinense*) *(figure 3-2).*

SPATIAL ORGANIZATION

The spatial organization of the Washington Monument Grounds is dominated by the Washington Monument, its associated knoll, and the physical and visual connections that occur between the monument grounds and other features of the Mall and Monumental Core. The monument grounds contain five distinct areas that together comprise the nationally-recognized landscape composition. These five areas include the monument and associated plaza, characterized by features arranged in concentric circles about the base of the monument; the oval mound that serves as an elevated base for the monument and plaza; the flats or relatively level lawn areas surrounding the mound; the sylvan areas that include groves of canopy trees grouped along the margins of the site; and the axes that extend north-south and east-west from the monument grounds to additional significant structures of the District.

The plaza is a circular paved area centered around the base of Washington Monument. The plaza is ringed by fifty American flags, but is otherwise little embellished. The flags provide a permeable edge to the space, and a sense of enclosure that is human-scaled. From the plaza, it is possible to view long distances in many directions.

The mound extends out from the monument and the plaza for approximately 400 feet. The mound is oval in shape, with the long dimension oriented east-west. The land slopes gently to the flats on all sides. There are few elements that occupy the mound other than turf grass and pedestrian walks providing access to the monument on the mound.

The flats encompass the relatively level topography surrounding the mound and framed by perimeter streets. Trees generally edge the flats, although there are scattered groves of flowering cherries within the otherwise open space characterized by grassy lawn.

The sylvan edge includes groves of trees and rows of street trees along the margins of the monument grounds and the perimeter streets. These groves and rows of trees are generally comprised of deciduous canopy trees that serve to frame the edges of the central open space surrounding the monument. These groves and rows also provide shade for visitors.

The axes extend through the monument grounds along cardinal directions. They are considered sacred spaces that are not intruded upon by vertical elements; street trees planted along the roads that cross the axes break to allow the space and views to extend through them. The east-west axis is broader and more formal than the north-south axis.

The monument acts as a powerful organizing element for the Mall, West Potomac Park, and much of the District of Columbia. Its alignment near the cross-axis of the Mall contributes to the monument's importance as a focal point, as does its height. The monument dominates the city skyline *(figure 3-3)*. The relative lack of trees and shrubs adjacent to the monument, its elevated position, and height make it an orienting feature throughout many parts of the District.

At the base of the monument, there is a circular plaza that affords commanding views of the grounds and the other nearby landmarks. Its location and elevated position provide one of the best spots in the District for viewing these landmarks *(figure 3-5)*. The central importance of the plaza is reinforced by the sense of space formed by the flagpoles and the system of sidewalks radiating outward from it *(figure 3-4)*.

The knoll itself is a focal point within the surrounding landscape. The level lawn of the flats below the knoll serves as a simple foreground and foil for the strong form of the knoll and monument. While most of the features of the monument grounds beyond the knoll are simple and unobtrusive, there is a pair of walks extending west from the monument that form a strong axial gesture and reinforce the importance of the visual and physical connections along the Mall area and the geometry of the Reflecting Pool area and the Lincoln Memorial.

In contrast with the open and relatively informal space of the grounds, the site is bounded on all sides by road corridors. The heavily traveled Constitution Avenue and 17th and 14th Streets bring the organizing character of the city's grid to the periphery of the site. The grid is reinforced by sidewalks and street tree plantings *(figure 3-6).* These systems extend beyond the grounds, connecting it to a larger urban context. The other roads that edge the site—Independence Avenue, 15th Street, Madison Drive, and Jefferson Drive—do not conform to the urban grid pattern. Independence Avenue and 15th Street have curvilinear alignments, unlike the streets in the city's grid, while Madison and Jefferson Drive follow a diagonal alignment. The lack of trees and reduced amount of traffic along Jefferson and Madison Avenues and 15th Street also reduce their prominence as circulation corridors.

The Monument Lodge, Survey Lodge, Sylvan Theatre, 16th Street parking lot, and the German-American Friendship Garden are each associated with smaller, more intimate spaces formed by a combination of buildings and plantings. The Monument Lodge is edged by small terraces along its front and side that provide a place for visitors to gather. Just south of the building, a stand of canopy trees provides shelter and a sense of human scale *(figure 3-7).*

The Survey Lodge is encircled by a one-way drive/parking area; a sidewalk begins to its north at the parking lot, wraps around the building, and links to the Independence Avenue crosswalk. A fenced service court occupies much of the immediate rear of the building. An open stand of canopy trees encloses the area, giving it a more human scale *(figure 3-8)*.

At the Sylvan Theatre, two wide drives or walks lead from the front and back of the theater south to Independence Avenue. An irregularly-shaped terrace surrounds a circular comfort station behind the theater and links to the rear sidewalk, a sidewalk to the Monument Lodge, and another

to Independence Avenue. A symmetrical network of walks connects dressing rooms and sheds to each other and down to the rear terrace. The front of the theater is open to the audience, while the sides and back are densely screened by shrubs. Groves of trees flank the theater, surrounding it to the rear and bringing down the scale of the area. Behind the theater and the grove of trees, the ground rises steeply to the streets above, creating a protected area *(figure 3-9).*

The 16th Street parking lot along Constitution Avenue is open and not planted with trees or shrubs. This automobile-dominated area contrasts with the open lawn which covers much of the site and the buildings and structures that are screened by vegetation *(figure 3-10).*

The German-American Friendship Garden's lushly-planted perennial and shrub beds also contrast with the open lawn character of the site and with other site plantings. The arrangement of sidewalks, circular seating areas, and small circular fountains provide an intimate setting and a sense of human scale *(figure 3-11).*

LAND USE

Within the project area, there are various land uses associated with buildings, structures, and landscape areas. These include:

- **commemorative**—the 555-foot-tall marble obelisk that stands as a memorial to George Washington is the primary commemorative feature on the monument grounds.

- **public gathering space**—the monument grounds serve as a gathering space for a variety of events, from organized protests to spontaneous gatherings.

- **visitor services**—the restrooms at the Monument Lodge, Survey Lodge, and the Sylvan Theatre, drinking fountains throughout the site, and park ranger tours at the monument are some of the visitor services available within the monument grounds.

- **commercial**—concessionaires offer opportunities to purchase refreshments, books, and souvenirs at the Monument Lodge, and books and souvenirs at the monument. Tickets for bus tours can be purchased from a kiosk located along Jefferson Drive.

- **security**—screening of visitors who take the tour of the monument occurs within a structure at the entrance to the monument. Jersey barriers placed around the perimeter of the plaza are another security measure intended to prevent vehicles from accessing the monument base.

- **recreation**—the monument grounds are used year-round for passive and active recreation, including active sports such as softball and soccer, and less formal sports such as jogging and bicycling. A kite-flying festival is held on the grounds annually in March that also constitutes a recreational land use

- **administration**—NPS ranger offices are located in the Survey Lodge.

- **maintenance**—a small service court is located behind the Survey Lodge.
- **transportation**—helicopter landings occur within the grounds.

CIRCULATION

(map 3-2)

The Washington Monument Grounds include vehicular and pedestrian circulation systems that follow the perimeter of the site and provide connections to features within its interior. Vehicular circulation occurs primarily along city streets. Perimeter roads include Constitution Avenue to the north, 14th Street to the east, the westbound lanes of Independence Avenue to the south, and 17th Street to the west. Roads that pass through the monument grounds are 15th Street and Madison and Jefferson Drives in the eastern portion of the site. All of these streets are bordered by sidewalks. There is also a parking lot in the northern portion of the grounds accessed from Constitution Avenue. Parallel parking is periodically available along Constitution Avenue. Within the site, there is limited vehicular circulation. A short NPS service road originates at Independence Avenue and loops around the Survey Lodge near the southwestern corner of the grounds. It is edged in places with parking spaces for NPS vehicles. There are tour bus drop-off lanes on the east side of monument grounds along 15th Street and Madison and Jefferson Drives.

Pedestrian walks lead from the perimeter sidewalks to the circular plaza at the base of the monument, and provide access to the Monument Lodge, Survey Lodge, Sylvan Theatre, and 16th Street parking lot. Additional walks lead toward the Lincoln Memorial. The nearest metro mass transit site is the Smithsonian Metro stop, two city blocks east of the grounds on the National Mall at 12th Street and Jefferson Drive. Each boundary street (17th, Constitution, 14th, and Independence) has multiple bus stops convenient for city travel.

City Streets along the Perimeter of the Monument Grounds

Constitution Avenue (LCS046871), which forms the north perimeter of the monument grounds, is a major east-west Washington, D.C., thoroughfare with four traffic lanes in each direction; it is also part of U.S. Route 50 *(figure 3-12).* Parallel parking is permitted in both the north and south curbside lanes before and after rush hours. Brick gutters and granite curbs edge much of Constitution Avenue's asphalt pavement. Between 15th and 17th Streets, Constitution Avenue is edged by concrete curbing. Asphalt has been laid over top of the existing brick gutter. The street corridor is edged by an eighteen-foot wide planting strip containing regularly-spaced street trees and grass. The planting strip is in turn edged by a twelve-foot-wide concrete sidewalk *(figures 3-13).* Constitution Avenue is often used for parades and festivals. Temporary bleachers are frequently erected within the planting strip south of Constitution Avenue. The light-gray concrete sidewalk is inscribed with a three-foot-square score joints, and has a broom finish. This finish is consistent with many Washington, D.C., sidewalks, although the standard for National Mall sidewalks is tan-colored exposed-aggregate. Sections of this sidewalk are cracked and differentially settled. Pedestrian crosswalks lead north across Constitution Avenue at the 17th,

16th (or Meridian), 15th, and 14th Street intersections, connecting the monument grounds with the Ellipse.

Fourteenth Street on the east perimeter of the monument grounds is a major north–south city street with three traffic lanes in each direction, as well as two left-turn lanes in the center *(figure 3-6)*. Parallel parking is not permitted on 14th Street. With access to and from the 14th Street Bridge ramp approaches only two blocks south of Independence Avenue, 14th Street has heavy rush hour traffic. It is a designated part of U.S. Route 1. A brick gutter and granite curbing border the street's asphalt pavement. The curb is edged by a six-foot-wide strip planted with grass and a few young street trees *(figure 3-14)*. A twelve-foot-wide exposed-aggregate concrete sidewalk, representative of the style used for most U.S. Capitol and National Mall areas, edges the planting strip. Pedestrian crosswalks lead east from the monument grounds across 14th Street to the Mall near its intersection with Madison and Jefferson Drives, and are found at the corners of intersections with Constitution and Independence Avenues.

Seventeenth Street (LCS046873) extends along the western perimeter of the monument grounds between Constitution and Independence Avenues *(figure 3-15)*. This major city street has two lanes in each direction. It is paved in asphalt and edged by asphalt gutters and granite curbs. A sixteen-foot-wide planting strip, containing street trees and grass, edges the pavement. A new twelve-foot-wide exposed aggregate concrete sidewalk, typical of the Mall, extends along the planting strip. Pedestrian crosswalks are located at the intersections of 17th Street with Independence and Constitution Avenues, and at the points where the two walks leading between the monument and the Lincoln Memorial intersect the road. These connect the monument grounds to West Potomac Park, Constitution Gardens, the Lincoln Memorial, Vietnam Memorial, Korean War Memorial, and the site of the new World War II Memorial.

Independence Avenue SW (LCS 046872) extends in an east-west direction between 14th Street on the eastern edge of the project area across 15th Street, and 17th Street on the western perimeter. Between 14th Street and 15th Street, Independence Avenue follows a curvilinear alignment. The road has three traffic lanes in each direction, and no curbside parking. West of its intersection with 15th Street, Independence Avenue splits into east- and westbound corridors. The westbound lanes border the southern perimeter of the project area. Two traffic lanes form the westbound corridor. These merge with two lanes of Maine Avenue southwest of the Survey Lodge before the resulting four lanes join 17th Street in a Y intersection at the southwest corner of the project area. The John Paul Jones Memorial is located on a traffic island at the Y intersection. The parkway-like alignment of Independence Avenue cuts through a former part of the monument grounds, isolating a wedge of land to the south and west near the Tidal Basin. Pedestrian crosswalks are located at the 14th and 15th Street intersections and between the Survey Lodge and the Tidal Basin near the Y intersection with 17th Street. Unlike other city streets, there is only a narrow four-foot-wide asphalt walk that edges the north side of Independence Avenue between 14th and 15th Streets. The road has a concrete curb and gutter.

Between 15th Street and the Survey Lodge, Independence Avenue is edged by concrete curb and gutter, and a twenty-foot-wide planting strip containing street trees and grass. This in turn is

edged by an eight-foot-wide asphalt sidewalk. Tour buses waiting for monument visitors park along this section of Independence Avenue. Pedestrians have eroded the grass around the walks in this congested area *(figure 3-16)*. A new twelve-foot-wide exposed-aggregate concrete sidewalk extends from the service road entry at the Survey Lodge to the 17th Street sidewalk along westbound Independence Avenue. It is separated from the roadway by a planting strip containing street trees and grass. The concrete curb and gutter of Independence Avenue, and its curvilinear alignment with a landscaped median, are atypical of Washington, D.C., streets and the Mall. The asphalt sidewalks on the north side of Independence Avenue are not consistent with similar features nearby or Washington, D.C., or Mall standards. The width, design, and heavy traffic associated with Independence Avenue present a challenge for pedestrians attempting to walk between the Tidal Basin and the Jefferson Memorial from the Washington Monument and Mall.

City Streets through the Monument Grounds

City streets that pass through the monument grounds include 15th Street and Jefferson and Madison Drives. Fifteenth Street follows a curvilinear alignment through the monument grounds between Constitution and Independence Avenues, passing to the east of the Monument Lodge. The northern end of 15th Street follows a historic entrance to the monument grounds, which is marked by the stone Bulfinch gateposts moved from their original location on the U.S. Capitol grounds *(figure 3-17)*. The current alignment of 15th Street dates to 2000; its curvilinear route through the monument grounds is now part of a north-south, through-city street, with two traffic lanes in each direction, no on-street parking, and heavy rush hour traffic. Within the monument grounds, the asphalt-surfaced 15th Street has an asphalt gutter and granite curb. Two tour-bus drop-off points edge 15th Street to its west, connecting to the monument and the Sylvan Theatre *(figure 3-18)*. Twelve-foot-wide sidewalks of exposed-aggregate concrete typical of the U.S. Capitol and National Mall line 15th Street on both sides.

Between Constitution Avenue and Madison Drive, the road is edged by a twenty-four-foot-wide grass planting strip on the west side and an eighteen-foot-wide planting strip to the east. Near the Monument Lodge, 15th Street curves to the east, while the sidewalk curves to the west, creating a lens-shaped grass area up to thirty feet wide in front of the Monument Lodge. The planting strip between the roadway and sidewalk is reduced to only eight feet in width. Metal post-and-chain fencing edges the sidewalks in front of the Monument Lodge and is used between Madison and Jefferson Drives to its east. These are intended to direct pedestrian traffic to cross 15th Street at the crosswalks. Between the bus drop-off near the Sylvan Theatre and Independence Avenue, a sidewalk follows the 15th Street curb. There is no planting strip. To the east of 15th Street, a new sidewalk curves away from the road, leaving a thirty-foot-wide planting strip of grass and street trees. Neither the curvilinear alignment of 15th Street nor the planting strips and sidewalks through the monument grounds from Constitution Avenue to Independence Avenue are typical of nearby city streets or the Mall.

Madison Drive between 14th and 15th Streets is a one-way, westbound, two-lane asphalt roadway that has recently been realigned to follow a radius of the Washington Monument. This new street

segment is an extension of Madison Drive north of the Mall. A tour-bus drop-off lane edges Madison Drive to the north. It connects to the eighteen-foot-wide exposed-aggregate concrete sidewalk that edges the road's granite curb. There are no gutters along the road. To the south side of Madison Drive, the road is edged by granite curbing, an eight-foot-wide planting strip, and a twelve-foot-wide exposed-aggregate sidewalk. Pedestrian crosswalks are located at 14th and 15th Streets.

Jefferson Drive extends between 14th and 15th Streets within the monument grounds. It is also recently realigned to follow a radial line extending from the Washington Monument *(figure 3-18)*. This street is an extension of Jefferson Drive to the south of the Mall. There is a tour-bus drop-off lane along the south side of Jefferson Drive. The asphalt road is one-way and leads eastbound. It is two lanes wide, with no gutters. The road is lined with granite curbing, edged by an eighteen-foot-wide exposed-aggregate concrete sidewalk along its south side. On the north side of Jefferson Drive there is a twelve-foot-wide exposed aggregate sidewalk. This walk is edged along its middle section by a low stone-faced retaining wall. The wall was installed when Jefferson Drive was realigned to protect a large tree, which has since been lost and replaced with a young tree. It is the only retaining wall on the monument grounds. Pedestrian crosswalks are located at 14th and 15th Streets.

Internal Vehicular Circulation

A short one-way NPS service road originates at Independence Avenue and loops around the Survey Lodge near the southwestern corner of the monument grounds. Parking for NPS vehicles occurs in association with the service road *(figure 3-19)*. Near the end of the service road, where it connects to Independence Avenue, is an extended two-lane concrete apron. The middle section of the service drive, west and northwest of the Survey Lodge, is comprised of two lanes of asphalt. The remaining asphalt section, north and east of the Survey Lodge, narrows to one lane. The middle section of the service road appears to be the oldest, with a pronounced crown, cobblestone and brick gutters, and a gravel surface set in asphalt seal coat. NPS vehicles parallel park to either side of the middle section, using part of the cobblestone gutter due to the narrowness of the road corridor. The road accommodates approximately twenty parked vehicles *(figure 3-20)*.

16th Street Parking Lot

One public parking lot occurs within the monument grounds. This lot is accessed from Constitution Avenue across from 16th Street. A one-way loop provides access to two long bays of parking before returning to Constitution Avenue *(figure 3-10)*. The loop road bisects the German-American Friendship Garden *(figure 3-21)*. Paved with asphalt, the parking lot accommodates 100 cars, with space for 25 diagonally-parked cars to either side of both the southbound entrance lane and the northbound exit lane. Five of the spaces are designated universally accessible. The paving is currently deteriorated. The parking lot is edged by heavy timbers. A broad grass median strip sits between the parking bays. It is on axis with the Jefferson Pier and views of the White House to the north and the Jefferson Memorial to the south.

Plaza and Pedestrian Circulation

A concrete and asphalt pedestrian plaza encircles the base of the Washington Monument. The plaza is comprised of an inner 74-foot-diameter circle of exposed-aggregate concrete paving, and an outer 123-foot-diameter ring of asphalt bordered by a flush concrete curb (*figure 3-22)*. The exposed-aggregate concrete surfacing is inset with thirteen five-pointed stars. The existing paving was re-established following the monument's recent restoration. The layout of the previous vehicular circulation encircling the base of the monument remains visible, but it appears that the level of the asphalt section was raised above the former plaza paving in order to eliminate a ramp and stair to the elevator at the entry lobby level.

Pedestrian walks extend from the plaza, connecting the monument to the sidewalks along adjacent city streets and the Monument Lodge, Survey Lodge, Sylvan Theatre, and 16th Street parking lot. All the walks from the plaza pass through the ring of Jersey barriers that were placed around the monument to exclude vehicular traffic.

Four walks lead from the eastern side of the plaza to the northeast and southeast. These are paved with asphalt *(figure 3-23)*. The first leads northeast towards the intersection of 14th Street and Constitution Avenue, terminating at a sidewalk west of 15th Street. This walk includes a short segment of older concrete *(figure 3-24)*. The second is a twelve-foot-wide walk that runs northeast toward Madison Drive. This follows a former vehicular road alignment. As the walk approaches 15th Street, it merges with a second walk. Together, they widen to form a gathering area around the ticket kiosk. There is also an asphalt-paved area with benches to the north of the walk which was used as a visitor waiting space before this area was redesigned. The third is a twelve-foot-wide walk leading east on axis with the U.S. Capitol. This walk eventually splits into two eight-foot-wide walks that pass north and south of the Monument Lodge. The fourth walk extends towards Jefferson Drive, splits near the intersection of 15th Street and Jefferson Drive, and T's into a walk to the rear of the Sylvan Theatre. A social trail continues up the steep slope to the sidewalk and bus drop-off along 15th Street *(figure 3-25)*.

There are also asphalt walks, eight feet wide and edged with steel, that lead from the front and back entrances of the Monument Lodge. These converge into a single walk that curves southwest to the comfort station at the rear of the Sylvan Theatre. This walk joins a twelve-foot-wide asphalt walk leading to the front and rear of the Sylvan Theatre from Independence Avenue. The walk, which also has steel edging, doubles as a service vehicle access route.

There are no walks extending north or south from the plaza. From the west side of the plaza, two parallel twelve-foot-wide exposed-aggregate walks extend to the west. These walks frame a grass panel extending to 17th Street and are aligned with walks that continue across the road to the Lincoln Memorial *(figures 3-26)*. The southern of these two walks makes one semicircular bend around a cluster of older mulberry *(Morus sp.)* trees *(figure 3-27)*. Post-and-chain fencing edges the walk near the trees. These walks also pass through a metal drop-barrier vehicular gate located within the line of Jersey barriers *(figure 3-28)*. A secondary eight-foot-wide asphalt walk splits off from the northern path, passing to the east of the 16th Street parking lot and providing a

connection to the German-American Friendship Garden and Constitution Avenue. Another walk leads diagonally across the grounds from the corner of the parking lot to the intersection of 17th Street and Constitution Avenue. This asphalt walk is eight feet wide with steel edging. The walk shows signs of deterioration *(figure 3-29)*. Another eight-foot-wide asphalt walk with steel edging splits off from the southwest exposed-aggregate walk and provides access to the Survey Lodge.

Two older concrete walks are found in the northeastern corner of the monument grounds within the block bounded by Constitution Avenue, 14th Street, Madison Drive, and 15th Street. One of these leads from the southwestern corner of the 14th Street and Constitution Avenue intersection towards the Washington Monument and terminates at the sidewalk on the eastern side of 15th Street *(figure 3-30)*. There is also a short segment of this concrete walk to the west of 15th Street. The other older concrete walk runs from the southeastern corner of the 15th Street and Constitution Avenue intersection in an east-southeasterly direction, terminating at the new sidewalk on the western side of 14th Street. Both of these walks are seven feet wide with score joints at seven-foot intervals. A newer asphalt walk also exists in this section of the monument grounds. It is an eight-foot-wide asphalt walk that leads from 15th Street to 14th Street.

TOPOGRAPHY

(map 3-3)

At forty feet above sea level, the mound that serves as the foundation for the Washington Monument is the highest point on the site *(figure 3-4)*. The base of the mound or knoll generally sits at an elevation of twenty feet above sea level, with the ground continuing to fall away on three sides. Elevations at the four corners of the site are as follows: the northwestern corner is approximately eleven feet above sea level, the southwestern and northeastern corners are approximately eight feet above sea level, and the southeastern corner along Independence Avenue east of 15th Street is higher at approximately thirty-five feet above sea level.

The knoll has a distorted oval shape, with the broadest portions oriented northeast and south-southwest. Along the sides, the grade climbs the 20-foot-change of elevation over a run of approximately 500 feet, at a slope of 6.6-percent. The narrower portions of the knoll are steeper, rising 20 feet over a distance of approximately 300 feet, at a slope of 4-percent. The steepest approaches are from the north and the southeast.

Elevated topography east of 15th Street serves to limit views of the Monument Lodge from the east and provide the illusion of a continuous greensward from the U.S. Capitol to the monument. This higher ground lies between 14th and 15th Streets and Madison Drive and Independence Avenue. It stands more than seven feet higher than the sidewalk at the intersection of 15th and Madison. This berm slopes down to the southeast corner of the block at a grade of more than 26-percent before meeting the sidewalk.

Relatively level topography lies to the north and west of the monument. Compaction is a problem on the Washington Monument Grounds due to heavy pedestrian use; some areas were nearly denuded of vegetation during the March 2003 site visit due to compaction and drainage problems *(figure 3-1).*

VEGETATION[4]

(map 3-4)

Various planning initiatives have contributed to the vegetation currently associated with the Washington Monument Grounds, though most seek to protect and enhance the sense of expansive open space surrounding the monument. The tree and shrub plantings serve to frame the central open space or enhance and screen buildings and structures, Lawn extends over 90-percent of the site's seventy-five acres *(figure 3-24).* Most of the groves and rows of trees are underlain by mown turf *(figure 3-31).* Only the dense shrub plantings around the Monument Lodge, Survey Lodge, and Sylvan Theatre lack turf groundcover.

Street Trees

The streetscapes that edge the Washington Monument Grounds are lined by deciduous canopy trees, primarily American and other species and varieties of elms. Street tree plantings typically edge surrounding streets to both sides. Only the segments of 15th Street, Madison Drive, and Jefferson Drive inside the monument grounds are void of street tree plantings *(figures 3-12, 3-14, and 3-16).*

Seventeenth Street is lined by a single row of elms, spaced approximately fifty feet on-center, within the middle of a fifteen-foot-wide planting strip between the street and sidewalk. Most of the trees are of significant size although some are relatively young replacements. A gap in the line of trees occurs between the two sidewalks that lead east to the monument to accommodate the view associated with the Mall's east-west axis. Constitution Avenue is edged by a double row of elms, spaced approximately fifty feet on-center. One row stands in an eighteen-foot-wide planting strip between the street and sidewalk; the second row edges the sidewalk ten feet to its south. Trunks of the trees are roughly symmetrical about the sidewalk. Most of the trees north of the sidewalk are younger than those to the south.

Street trees also edge 14th Street, where elms are spaced about fifty feet on center. Some stand between the street and the sidewalk in an eight-foot-wide planting strip. Others edge the sidewalk between eight and thirty-eight feet to its west.

Independence Avenue is lined by a single row of elm trees along its length, with a gap at the 16th Street axis. The spacing of the trees varies in front of the Survey Lodge, where the trees generally relate to the building rather than the street. Between 14th and 15th Streets, the trees are primarily American and Wilson's elms *(Ulmus wilsoniana x japonica)* spaced sixty to sixty-five feet on-center; those along the rest of Independence Avenue stand approximately fifty feet on-center. The

trees are set back from the road from six to eleven feet. Along the eastern segment of the road corridor, the sidewalk lies immediately adjacent to the street, eliminating the planting strip in this area. Here the street trees are planted five feet from the edge of the sidewalk.

Groves of Trees

There are numerous groves of trees that constitute the sylvan area of the monument grounds. These include groves of cherry trees as well as deciduous canopy trees. Along the northern edge of the site are three groves of Yoshino cherry trees (*Prunus* x *yedoensis*) of varying sizes and ages. The first is a large grove west of the parking lot. This grove is composed of more than fifty mature trees *(figure 3-31).* The second, located 140 feet to the southwest, includes a single mature cherry tree surrounded by nine newly planted trees *(figure 3-32).* The third grove is situated halfway between the parking lot and 15th Street. It consists of five mature trees and eleven younger ones. Additional trees have also been recently added south of the German-American Friendship Garden, flanking it to either side.

There are also two rows of canopy trees on the grounds. Approximately 100 feet north of the Monument Lodge there is a line of six, 25- to 30-inch-diameter willow oaks (*Quercus phellos*) oriented north-south *(figure 3-33).* Approximately 225 feet east of the Survey Lodge is a line of eight 18- to 24-inch-diameter sugar maples (*Acer saccharum*) oriented east-west *(figure 3-34).* Groves stand at the southwest and southeast corners of the site along Independence Avenue. In the southeast corner of the monument grounds, the grove is composed of canopy trees of varying sizes, including elm, sycamore (*Platanus occidentalis*), Basswood (*Tilia americana*), chestnut (*Castanea spp.*), black locust (*Robinia pseudoacacia*), oak (*Quercus spp.),* and pine (*Pinus spp.*). In the southwest corner of the site the grove is comprised of canopy trees such as various maple species, green and white ash (*Fraxinus pennsylvanica, F. americana*), catalpa (*Catalpa bignonioides*), buckeye (*Aesculus* spp.), and American elm *(figure 3-35).*

There are also a few individual trees and small groups of trees scattered around the grounds that are not part of groves or street tree patterns. Most important are the two mature mulberry trees that stand just over 300 feet southwest of the monument *(figure 3-27).* These were likely not planted but arose naturally from seed. There is also a sycamore east of the street trees on 17th Street, a black walnut (*Juglans nigra*) south of the linear grove of maples, a group of elms in the northeast corner of the site, and three maples north of Madison Drive.

The remaining vegetation on the grounds relates to specific buildings or garden areas such as the Monument Lodge, Survey Lodge, Sylvan Theatre, and German-American Friendship Garden. The vegetation associated with each of these sites is described below.

Monument Lodge Vegetation

Around the Monument Lodge, vegetation includes two fenced shrub areas to the north of the building, foundation plantings along its front and sides, and canopy trees south of the building. South of the building, five willow oaks form a canopy that stretches from the front sidewalk to

the granite-paved sitting area *(figure 3-36)*. Two small American hollies (*Ilex opaca*), underplanted with low deciduous shrubs, screen the rear addition to the Monument Lodge on its south side *(figure 3-37)*. The original Monument Lodge building is surrounded by loosely arranged foundation plantings of evergreen and deciduous shrubs. Two American hollies and a yew (*Taxus baccata*) screen the rear addition on the north side. Northwest of the Monument Lodge addition is a fenced planting area with several low, pruned evergreen hedges surrounded by low juniper groundcover (*Juniperus spp.*). A single row of Chinese privet (*Ligustrum sinensis*) is pruned to form a low hedge across the back of a sunken terrace that provides access to the rear addition *(figure 3-38)*. The rest of the monument grounds landscape is maintained in mown turf exhibiting varying degrees of damage from pedestrian traffic.

Survey Lodge Vegetation

A stand of canopy trees surrounds the Survey Lodge, and shrub plantings edge the building to either side and extend across the rear façade *(figure 3-8)*. The stand of trees includes elm, sugar maple, hedge maple (*Acer campestre*), white fir (*Abies concolor*), Nordmann fir (*Abies nordmanniana*), catalpa, serviceberry (*Amelanchier canadensis*), sawtooth oak (*Quercus acutissima*), and Norway spruce (*Picea abies*) *(figure 3-39)*. Large, loosely planted shrub beds are located behind and on either side of the building; they contain predominantly deciduous species and a few evergreens. Species include crape myrtle (*Lagerstroemia spp.*), white pine (*Pinus strobus*), azalea (*Rhododendron* spp.), American holly, and chastetree (*Vitex agnus-castus*). Liriope (*Liriope* spp.) and euonymus (*Euonymus* spp.) are used as groundcovers. Both beds narrow as they wrap around the front corners of the building to meet the front walk. The rest of the landscape around the Survey Lodge is maintained in mown turf.

Sylvan Theatre Vegetation

The Sylvan Theatre is edged to the rear and sides, including the stage and dressing rooms, by dense shrub plantings *(figure 3-9)*. Backstage plantings act as walls or curtains to screen views from the audience. Two groves stand at 45 degree angles to center stage, while a third grove stretches in a broad crescent around the back of the theater complex, screening it from outside views. A closely-planted double row of Burford hollies (*Ilex cornuta 'Burfordii'*) lines the back of the stage. Behind the hollies, a large white pine underplanted with mown turf, stands between two sets of flagstone steps. On either side of the stage, rows of Chinese privet form corridors to the dressing rooms. On the southwest side of the stage, a mass of mixed shrubs and small trees edges the stage and wraps around the building towards the dressing room and shed. The shrub mass ends about fifteen feet from the stage. It begins again with a small spruce (*Picea spp.*) followed by dense winter honeysuckle and forsythia (*Forsythia intermedia*) plantings five to six feet in height; this mass continues around the complex to the flagstone steps. Two white pines and an American holly are interplanted in this mass. The mass thins as it reaches the steps. Mown turf fills gaps between shrubs.

A similar mass of winter honeysuckle and forsythia, interspersed with American holly and white pine, wraps from the northeast side of the stage around to the flagstone steps to the east. A

firethorn (*Pyracantha spp.*) shrub extends from either side at a 45 degree angle from center stage edging the cherry groves in this area.

The cherry groves around the Sylvan Theatre are comprised of Yoshino cherry trees. The first is located 145 feet west of the theater. It includes more than twenty mature trees placed in a dense cluster *(figure 3-40).* Another grove is located 130 feet northeast of the stage. It features a similar dense core, but contains fewer mature and several younger cherry trees. Two large white pines are planted along its southern edge. This grove loosely overlaps a third, crescent-shaped grove, which stretches nearly 700 feet from east of the theater along 15th Street to its west side along Independence Avenue. This grove has more than fifty mature trees and is densest on the east side. A large elm and a shellbark hickory (*Carya laciniosa*) also stand within the crescent-shaped grove of cherries behind the theater.

German-American Friendship Garden Vegetation

The German-American Friendship Garden (LCS 046856) was designed in the 1980s by Oehme Van Sweden and Associates *(figure 3-11).* The garden features two planting areas that symmetrically flank the entrance to the 16th Street parking lot. Each area is comprised of two rectangular planting beds separated by a circular seating area and fountain *(figure 3-41).* The beds contain a mix of shrubs, grasses, and perennials. Species include sweetbay magnolia (*Magnolia virginiana*), serviceberry, witch hazel (*Hamamelis mollis*), yew (*Taxus baccata*), St. John's wort (*Hypericum calycinum*), Russian sage (*Perovskia atriplicitolia*), black-eyed Susan (*Rudbeckia spp*.) and bear's breeches (*Acanthus mollis*). A mature elm stands in the center of the west planting bed. It obviously predates the garden and was incorporated into its design. This tree may have been a street tree associated with the former alignment of 16th Street.

BUILDINGS AND STRUCTURES

(map 3-5)

Washington Monument

The Washington Monument (LCS 001372) is sited on Reservation No. 2, near the crossing point of the two major planning axes in Washington, D.C. It is located approximately 350 feet east of the axis defined by the White House and the Jefferson Memorial and is approximately 125 feet south of the axis defined by the U.S. Capitol and the Lincoln Memorial. The monument sits in the center of a circular paved plaza lined with American flags *(figure 3-42).*

The Washington Monument was constructed between 1848 and 1884 and is a stone masonry structure built in the form of an Egyptian obelisk. It stands 555 feet tall and has a square base measuring 55 feet on each side. The monument contains an elevator and stair leading to an observation deck, as well as interpretive displays and a small souvenir shop. The monument was stabilized between 1933 and 1938, and again in 1976. In 1994, the structure underwent preservation treatments.

A noticeable color change remains apparent in the marble on the monument at the level where work stopped in 1854 between the two phases of construction. The monument is one of the world's tallest freestanding stone masonry structures. Along with the dome of the U.S. Capitol building, the Washington Monument remains the dominant 19th-century architectural and engineering feature of the city's skyline, thanks to zoning height restrictions in the city. For additional information on the monument, see the Washington Monument Historic Structures Report (HSR).

Entry Station

In 2001, a small, one-story, temporary entrance structure, measuring 16 feet by 28 feet and mimicking the masonry of the Monument, was added to the monument's east façade. Known as the "entry station" or "interim security building," the flat-roofed structure, clad with Dryvit, houses a security screening point for visitors to the monument *(figure 3-43)*.

Monument Lodge

The Monument Lodge (LCS 100069), located on axis with the east side of the Washington Monument, faces east towards 15th Street *(figure 3-7)*. The Greek Revival-style, marble Monument Lodge was built in 1888, and is approximately twenty-two feet wide by forty-four feet long. A concrete-block concession addition, built on the west side of the Lodge in 1963, is approximately thirty-eight feet wide by fifty-five feet long. The 1963 addition, more than twice the size of the original Monument Lodge, blocks an octagonal bay projection on its west elevation, and dominates both the north and south elevations *(figure 3-38)*. The original Monument Lodge structure contains a souvenir shop accessed from its earlier east entrance, and restrooms accessed from the outside on the north and south. The concrete-block addition contains a fast food and beverage concession area including an office, storage, and mechanical equipment. To provide universal accessibility to the front door of the Monument Lodge, a temporary wooden platform/ramp has been added, covering the front steps and small concrete-paved area in front of the door. A number of asphalt walks intersect around the Monument Lodge. Evergreen shrub and hedge plantings surround the Monument Lodge in addition to mature evergreen and deciduous trees. For additional information on the Monument Lodge, see the Monument Lodge HSR.

Survey Lodge

The Survey Lodge (LCS 100070) is sited 750 feet southwest of the Washington Monument, adjacent to Independence Avenue, and faces southeast. Constructed in 1886, it was originally designed as a one-story, ell-shaped marble and granite boiler house with gabled slate roofs. The Survey Lodge retains a forty-foot-tall chimney at the southwest end of the ell; three gables, facing southwest, northeast and southeast; and a cupola roof ventilator at the northeast gable roof intersection. Constructed in 1901, a marble-and-stucco, single-story addition to the south of the ell also has a slate gable roof. This addition filled out the original ell to an approximately forty-by-forty-three-foot footprint, and added a second gable facing southwest, as well as a main entrance to the building on the southeast eave wall *(figure 3-8)*. A contemporary wooden board

fence constructed in 1988 on the northwest side of the Survey Lodge encloses a forty-three by sixty-seven foot service court with a large wood-and-metal shed. The fence completely screens the northwest marble-and-granite elevation of the Survey Lodge. The Survey Lodge is encircled by a one-way service loop drive. The front (southeastern) entry to the building is accessed via a new, curvilinear six-foot-wide exposed-aggregate concrete walk, while the rear entry to the basement level is accessed by a similar four-foot-wide walk. Originally built to supply steam to the Washington Monument elevator, the Survey Lodge now serves as the NPS headquarters for the National Mall and monuments. It contains a visitor contact station, handicapped-accessible restrooms, offices and facilities for NPS staff, and storage space. The immediate grounds around the Survey Lodge are landscaped with mature deciduous and evergreen tree and shrub plantings, which largely screen this structure from view from both the monument plaza and Independence Avenue. For additional information on the Survey Lodge, see the Survey Lodge HSR.

Sylvan Theatre

The Sylvan Theatre (LCS 046850) stage is located approximately 400 feet southeast of the Washington Monument near the northeastern corner of the intersection of 15th Street and Independence Avenue. Set among groves of mature trees, this open-air theater is aptly named. The raised wooden stage faces northwest towards the monument, with the grass knoll of the monument forming a raked-seating amphitheater *(figure 3-9)*. The lawn seating area has a capacity of approximately 4,000 people, and might accommodate a standing-room-only crowd of approximately 9,000 people with sightlines to the stage. The Sylvan Theatre has been used for major theatrical and musical performances and film showings, as well as a platform for speeches and protest rallies. The Sylvan Theatre was originally constructed and dedicated in 1917 as a venue for Shakespearean performances on an open-air stage. Since that time, the open-air stage has expanded towards the audience and evolved into a raised wooden platform four feet high, with a metal-and-wood roof deck covering the seventy-five-foot-wide by thirty-two-foot-deep stage, and an acoustical rear wall. A metal light bridge has been added to the front, and the stage has been thrust out an additional eighteen feet past the roofline proscenium *(figure 3-44)*.

Dressing areas in the open-air privet hedge wings have been replaced by two flat-roofed metal buildings, each measuring approximately twenty by thirty-six feet, flanking stage right and the left rear; these also contain prop storage. Two small flat-roofed metal buildings at the rear of the stage, each measuring approximately ten by sixteen feet, provide electrical power and storage for light and sound equipment. At the rear of the structure, backstage is still accessed by two six-foot-high flights of flagstone steps set into the side of an earth mound, with a wooden ramp (not handicapped accessible) added to the side of the southwestern steps. Hidden from view of the audience at the rear of the Sylvan Theatre is a ovular, flat-roofed metal comfort station with aggregate panels, measuring approximately twenty-eight feet in diameter *(figure 3-45)*. This structure is set ten feet below the elevation of the intersection of 15th Street and Independence Avenue, hiding it from view from this direction also. An eight-foot-wide asphalt walk leads northeast from this comfort station to the Monument Lodge, and a twelve-foot-wide asphalt walk leads southwest, providing for pedestrian and service vehicle access to stage left front and Independence Avenue. Deciduous and evergreen tree and shrub plantings around the sides and

rear of the Sylvan Theatre screen much of the complex from view of nearby 15th Street and Independence Avenue. Mature cherry tree groves flank the audience's view of the stage, but the roof structure over the stage appears more imposing from the lower portion of the amphitheater.

Bulfinch Gateposts

Two stone gateposts (LCS 046862, 046863) flank the 15th Street entry to the monument grounds *(figure 3-46 and 3-47)*. These are situated at the southwestern and southeastern corners of the intersection of Constitution Avenue and 15th Street. The gateposts, attributed to Charles Bulfinch, were originally on the U.S. Capitol grounds, and were relocated in 1874 to what is now Constitution Avenue. Each of these rusticated stone piers with carved decorative capstones measures approximately four feet square and thirteen feet tall. The gateposts are fashioned from tan sandstone. Currently, the gateposts display some blackened, weathered surfaces and evidence of light-colored surface spalling. The Bulfinch gateposts are a frequent prop in tourist photos of the monument grounds.

Jefferson Pier

The Jefferson Pier (LCS 011969) marks the intersection of the axial alignments of the U.S. Capitol and White House, about 350 feet northwest of the Washington Monument *(figure 3-48)*. It marks the location of the first meridian in the United States, surveyed by Thomas Jefferson. The current marker was erected in 1889 after an earlier one was removed in 1874. The marker is a twenty-four by twenty-four inch granite block with a pyramidal cap and has a metal spike visible in its center. The marker's name and date of re-erection are etched into its west face. A six by seven-and-a-half foot exposed-aggregate concrete, at-grade base surrounds the marker.

Kiosks

Two kiosks are present on the Washington Monument Grounds. The first is an NPS ticket booth for reserved tickets to ride elevator to the top of Washington Monument west of 15th Street sidewalk at Madison Drive intersection. The second is a tour bus ticket booth on the south side of Jefferson Drive at the tour bus drop-off *(figure 3-18)*. Both kiosks are hexagonal in shape with curved Japanese-pagoda-style metal roofs. The tan NPS ticket kiosk is approximately seven feet on a side with a brown roof approximately nine feet high at the overhanging eaves and thirteen feet overall *(figure 3-49)*. The NPS kiosk is apparently a surviving Mission 66-era structure that was moved to this location with the realignment of 15th Street. The newer dark-blue Tourmobile Sightseeing kiosk is smaller, approximately six feet on a side with a light blue roof approximately eight feet high at the eaves and twelve feet overall. Similar kiosks are found on the Mall and at other Washington, D.C., tourist sites.

Monument Lighting Vaults

Four concrete lighting vaults are located around the monument, one on each of its four sides immediately outside the perimeter of the plaza *(figure 3-50)*. Each lighting vault measures

approximately fifteen by thirty feet, and is set largely below grade, rising only two feet above the ground level. A metal "clamshell" covers each vault, opened at night to enable the eight high-powered floodlights within to illuminate the sides of monument.

Retaining Wall

There is only one retaining wall found on the monument grounds along the sidewalk on the north side of Jefferson Drive. This low concrete seat wall, faced in granite, was added relatively recently to retain a grass embankment formed by the realignment of Jefferson Drive.

SMALL-SCALE FEATURES

(maps 3-6 through 3-10)

Various types of small-scale features are found throughout the Washington Monument Grounds. Most of these are site furnishings that support visitor needs and safety. There are also small-scale features relating to signage and commemoration.

The Elevation Obelisk

A tiny replica of the monument was placed on the site in 1898 by the Coast and Geodetic Survey as a benchmark to measure settlement of the monument. The concrete replica Elevation Obelisk (LCS046864) is located in an underground manhole approximately 150 feet south of the center of the monument. This feature is not visible aboveground.

Site Furnishings

Flagpoles

Fifty flagpoles are arranged around the perimeter of the plaza centered on the monument. The twenty-two-foot-tall aluminum poles are bolted to individual bases set in concrete, and fly all-weather American flags twenty-four hours a day *(figure 3-51).*

Lighting

Three types of lighting are used on the grounds to illuminate the Washington Monument at night. Some are housed in the four light vaults discussed earlier in the Buildings and Structures section. The other two lighting types are floodlights located a few feet from the monument's base, and spotlights mounted on elevated concrete piers around the site. The floodlights are housed in eighteen- to twenty-inch-tall sheet-metal boxes, angled toward the monument *(figure 3-22).* Each side of the monument is illuminated by a single box of floodlights, except the east side, which has boxes to either side of the security entrance. Four spotlights, each twelve-feet tall, are mounted on concrete piers 175 feet northeast of the Survey Lodge, 175 southeast of the Sylvan Theatre, 412 feet north of the Monument Lodge, and adjacent to the southwest side of the 16th

Street parking lot. Each pier is topped by a three-foot-wide circular platform on which the lights are mounted *(figure 3-52)*.

Three types of overhead lighting found within the monument grounds. The "Twin Twenty" double-globe light is the most common, found along the streets which bound or cross the site *(figure 3-53)*. These are composed of a cast-iron light pole painted either black or green, supporting acorn-shaped luminaires. A similar, single-lamp light—the "Washington Globe"—is found occasionally along the newly redesigned 15th Street, behind the Survey Lodge, the Sylvan Theatre, and on either side of the Monument Lodge *(figures 3-54 and 3-18)*. The third type of light—the "Olmsted" standard—appears in only one place within the grounds along 14th Street opposite the Mall. The Olmsted globe is a single clear cylinder lamp mounted on a cast-iron pole. This light fixture is used along the Mall *(figure 3-55)*.

Traffic lights are found at each intersection and crosswalk throughout the site. These vary in form depending on the configuration of the intersection. The lights are frequently mounted on individual poles similar in form to those used for overhead lighting; in some cases they are mounted on the overhead lighting poles *(figures 3-15 and 3-49)*.

Benches

Four bench types are found on the monument grounds. The most prevalent type is present along most of the major sidewalks. It is composed of a black cast-iron frame set in a concrete pad with an unpainted wood-slat seat and back. This bench type is also common throughout the Mall, West Potomac Park, and much of the District *(figure 3-56)*. Benches are generally placed at regular intervals along the sidewalks of District streets within the Monumental Core area, although there are no benches along 17th Street or Independence Avenue. Along Constitution Avenue, they are spaced approximately eighty feet on-center. At the corner of 14th Street, there is a cluster of three of the benches.

This bench type is also found along 14th Street spaced approximately fifty feet apart. These benches are also found on the west side of 15th Street at the bus drop-offs. They are clustered in two groups of three at the north drop-off, and in four groups of two at the southern drop-off. A similar arrangement is found on Madison and Jefferson Drives, where two sets of these benches are located near the bus drop-off.

Eight of the cast-iron-and-wood-slat benches are located in an old queuing area north of the Monument Lodge, and three more are found along a walk leading between the Monument Lodge and the Sylvan Theatre. Three of the benches are located along a sidewalk in the middle of the southeastern corner of the grounds, and there are also a few associated with the German-American Friendship Garden.

The second bench type is found around the monument plaza *(figure 3-57)*. Installed in 2000, these are backless, with black cast-iron frames and gray recycled-plastic slats. There are eight groups of two benches set around the perimeter of the plaza at 100-foot intervals.

The third bench type is located near the southwest corner of the Monument Lodge *(figure 3-38)*. Here there is a group of three backless benches composed of concrete piers and unpainted wood slats set in a granite block paved area outside the refreshment stand.

The fourth bench type is found in the German-American Friendship Garden. In addition to cast-iron-and-wood-slat benches, there are polished-granite backless benches set at grade. Three of these are set on the edge of each circular gathering area in the garden facing away from the parking lot entrance *(figure 3-41)*.

Drinking Fountains

There are two styles of drinking fountains located around the grounds. The first type, known as the MDF model, has a brown-painted cylindrical sheet-metal support and arm, set eight inches below it that hold stainless steel bowls *(figure 3-11)*. These fountains are found adjacent to the Dedication Plaque east of the monument and in the German-American Friendship Garden. The second type, known as the Haws model, features a brown-painted square support with a single stainless steel bowl on a stainless steel arm *(figure 3-52)*. These drinking fountains are more common on the site, located along 17th Street at sidewalk intersections, on the corner of 17th Street and Constitution Avenue, on the northwest side of the Survey Lodge, south of the Sylvan Theatre, and in front of the Monument Lodge.

Trash Receptacles

Trash and recycling receptacles are distributed around the site *(figures 3-1 and 3-13)*. The primary type is the 'Tulip,' comprised of a steel frame with vertical wood slats, set six to twelve inches above the ground on a steel post. There are also steel mesh receptacles in some locations. Both types are painted black. Recycling containers are marked with a sign, or covered by a black plastic lid. One or two receptacles are clustered near most of the benches, including those at bus drop-offs. Receptacles are also located at the terminus of the east-west sidewalks along 17th Street, along a portion of Independence Avenue between the theater and the Survey Lodge and around the Monument Lodge, behind the Survey Lodge, and behind the comfort station at the theater.

Fencing and Barriers

Post-and-chain fencing is found in numerous locations around the monument *(figures 3-7 and 3-21)*. This fencing type is comprised of three-foot-high posts spaced on average six feet apart, and connected by a single heavy chain. Both the posts and chains are painted black. This type of fencing is used on both sides of 15th Street in front the Monument Lodge, and along on 14th Street. It is also used in association with the 16th Street parking lot, along the Survey Lodge service drive, in front of the Sylvan Theatre, and along the sidewalk edging the older mulberry trees. Two other fencing types are used at the grounds. These include a two-foot-tall decorative cast-iron fence enclosing two planting areas adjacent to the Monument Lodge, and an eight-foot-tall wooden board fence surrounding the service area behind the Survey Lodge *(figure 3-37)*.

Concrete Jersey barriers were erected around the base of the monument in 1998 as a temporary security measure. The barriers are placed in two rows that form a loose circle with four- to five-foot breaks that allow pedestrians to pass *(figure 3-23)*. On the northwest side of the monument, a steel hydraulic vehicle access gate has been placed along the walk within the lines of barriers to allow emergency and maintenance vehicles to enter the area around the monument *(figure 3-28)*.

Stone-lined Drainage Ditch

Cobblestone drainage ditches border either side of the Survey Lodge service drive. The ditches are approximately two feet wide and are lined with granite Belgian block, or a combination of Belgian block and brown river stone. The ditches extend for approximately 200 feet along the drive *(figure 3-20)*.

Signage

Sign types on the grounds include memorial plaques, interpretive signage, and regulatory, directional, and informational signs. The Dedication Plaque is located on the east side of the monument just outside the circle of flagpoles. The six-by-five-and-a-half-foot bronze plaque is mounted on a concrete base that is eighteen to twenty-four inches tall. The plaque details the origins of the monument and names of those who aided in its planning and construction *(figure 3-58)*. It is canted and faces east.

Two anniversary plaques are laid in the paving at the sidewalk intersections mid-block along 17th Street. These plaques commemorate the 100th anniversary of the completion of the monument, and were dedicated in observance of the 50th anniversary of the National Society of Professional Engineers in 1984 as part of the completion of the walks *(figure 3-59)*.

Interpretive signage includes a four-by-eight-foot, eight-inch-thick, polished black granite interpretive panel with rusticated edges that stands 150 feet north of the Monument Lodge, and two NPS waysides. The interpretive panel features etched depictions of George Washington as a statesman and soldier. It is set in a concrete base *(figure 3-60)*. Two identical NPS-standard metal-frame fiberglass interpretive signs are located along 17th Street at the mid-block crosswalks *(figure 3-61)*. The signs describe the World War II Memorial under construction across 17th Street.

Other signs are regulatory, directional, and informational in nature. These signs are composed of painted metal, mounted on a variety of poles. NPS signs are mounted on wood posts, and traffic signs are mounted on metal posts, light poles, or traffic poles *(figure 3-6)*. There are also two bus-tour information panels located at the bus drop-offs along 15th Street and Jefferson Drive.

Fountains

The German-American Friendship Garden has two fountains. These are granite pavers offset from the larger circular granite paved areas of the garden. The edge of each fountain is flush with

the grade of the surrounding paving. The fountain pool is formed by the paving sloping gently toward a low point in the center of the circle. Three grates around the inside of each circle cover nozzles that spray water. A third circular grate in the center of each fountain collects the water for recirculation.

Other Small-scale Features

Other small-scale features include modern pedestal phones outside the Monument Lodge and at the corner of Constitution Avenue and 14th Street *(figure 3- 38)*; more traditional pedestal phones outside the Survey Lodge and at the bus drop-offs at Madison and Jefferson Drive; two timber picnic tables and a bike rack at the Survey Lodge; steel-pole-mounted gates at the entrance to the Survey Lodge service drive and the entrance and exit to the 16th Street parking lot *(figure 3-21)*; black-painted steel handrails outside the Monument Lodge and Survey Lodge; and steel bollards at ADA-accessible ramps along 15th Street.

VIEWS AND VISTAS

Long views and vistas both to and from the Washington Monument are integral to its role within the greater Washington, D.C., urban and regional context. Restrictions on building heights in the District of Columbia perpetuate the monument's identity as the tallest feature of the city skyline. Visible from many parts of the city as well as from across the Potomac River in Virginia, the Washington Monument serves as an orienting and focal point for identifying Washington, D.C.'s, Monumental Core. From the observation deck at the top of the monument, broad panoramic views of the city and region are available.

Within the Mall area, the monument plays a similarly central role. The monument marks the approximate center point of the cardinal axes ordering the Mall. As a result, the monument and grounds feature primary axial vistas to and from the major landmarks located at the cardinal termini of the Mall, including the U.S. Capitol to the east; the White House to the north; the Lincoln Memorial to the west; and the Jefferson Memorial to the south. These axial views are accessible to visitors from the top of the monument and from the grounds, including the plaza at the monument's base.

From the plaza, trees planted along the sides of the Mall screen views of the many buildings lining adjacent avenues, as well as some middle-ground features. The U.S. Capitol's west façade, including the steps and dome, are the focus of this vista. When viewed from the top of the monument, the U.S. Capitol dome dominates the view of the larger region, with the green swath of the Mall between the two landmarks *(figures 3-23 and 3-62)*.

The vista to the White House is less formal *(figures 3-51 and 3-63)*. The fact that the monument is slightly off-center from the axis between the White House and Jefferson Memorial is most obvious looking in this direction. The view from the Jefferson Pier, which marks the original planned location of the monument, is in line with this north-south axis. From the top of the

monument, the view to the north features the Ellipse in the foreground, the White House's south façade, and 16th Street stretching away to the north.

The vista to the Lincoln Memorial is more formal and ordered *(figures 3-64 and 3-65)*. Rows of trees frame the vista, lining the Reflecting Pool to either side. From the plaza level, the Reflecting Pool and its rows of trees frame the west façade of the Lincoln Memorial. From the top of the monument, the Reflecting Pool captures the reflection of the monument for the viewer. The view to the Lincoln Memorial dominates the foreground and middle ground of this view, with the Potomac River and sweeping panoramic views of Virginia visible in the background.

The vista to the Jefferson Memorial is the least visible today *(figure 3-66)*. From the observation deck, it is a focal point in the view to the south, with the Tidal Basin in the foreground and the Potomac River stretching away into the distance to the background and right *(figure 3-67)*. On the ground level, trees obscure the view of the Jefferson dome from the Washington Monument plaza. As noted above, the north-south axis between the White House and Jefferson Memorial runs through the Jefferson Pier and not through the monument itself. The Jefferson Memorial is clearly visible from the pier through a cleared vista in the trees. The Tidal Basin is not visible from this point due to an intervening rise in the topography.

The monument is also a primary focus of the views from the two main axes. The views on the east-west main axis of the Mall between the monument and the U.S. Capitol and Lincoln Memorial are designed as formalized vistas. However, the views along the north-south axis from the Jefferson Memorial and White House—owing to the monument's lack of alignment with this axis—appear broader, with the monument functioning more as an orienting feature within a larger view from these sites.

The vista from the U.S. Capitol to the west is dominated by the Washington Monument *(figure 3-68)*. The Mall, lined on either side by trees, frames this vista from the U.S. Capitol steps. The Capitol reflecting pool is meant, like that at the Lincoln Memorial, to reflect the image of the monument from this vantage point.

The vista from the White House to the monument highlights its off-axis location *(figure 3-69)*. The vista between the White House and Jefferson Memorial is revealed through a clearing in the trees. The monument is nonetheless a highly visible focal point of this view, slightly to the left of the formal axis. Trees obscure views of the monument grounds at its base.

The vista of the Washington Monument from the Lincoln Memorial's western steps is very formal, framed by rows of trees along the Reflecting Pool *(figure 3-3)*. The mirror image of the monument in the reflecting pool is meant to heighten the drama of this vista.

The view from the Jefferson Memorial across the Tidal Basin features the Washington Monument as its primary focal point *(figure 3-70)*. The foreground of this view is the Tidal Basin; trees lining the basin and a small rise in topography block middle-ground views of the

grounds and buildings. A cleared vista provides a view of the White House façade along the true north-south axis.

In addition to these many primary landmark views, the monument dominates a range of middle-distant views from within the Mall.

Within the monument grounds, vegetation and topography are used to screen views of adjacent site features such as the Monument Lodge, Survey Lodge, Sylvan Theatre, and the German-American Friendship Garden. The visual effect in the long views from outside the grounds is of the monument rising up from within groves of trees and swaths of turf lawn, without interruption from these adjacent support structures.

The Monument Lodge is sited just west of a berm that occupies the grounds between 14th and 15th Streets, which helps to obscure views of the structure from the U.S. Capitol. It helps create the illusion of an uninterrupted swath of grass reaching west to the base of the monument. The plantings on the west side of the Monument Lodge partially screen the views of this building from the monument plaza. The cherry groves around the Sylvan Theatre block some views of the structure, although an open view from the stage area towards the monument is a prevailing feature of the theater area. The dense groves and plantings around the Survey Lodge screen views of the structure both from within and outside the grounds. New plantings around the south side of the German-American Friendship Garden may eventually screen views of this area from the plaza level around the monument.

ARCHEOLOGICAL RESOURCES

Since much of this site consists of fill soil that was imported to the monument grounds, there is likely little prehistoric information that could be gained from archeological investigation or excavation. Those portions of the site that are less disturbed and those areas that have seen several layers of construction, such as road corridors, have the potential to yield resources and information relating to more recent history. The fish ponds, swimming pools, canal, and building sites that occupied positions on the grounds at various points in the last 200 years likely have left information about their presence.

Resources that exist include the debris from the construction of the monument; rejected or damaged memorial stones discarded and covered with fill associated with the knoll; and the remains of the steam tunnel that ran from the Survey Lodge when it provided steam to power the monument.

ENDNOTES

[1] http://www.pe.net/~rksnow/dc.htm and http://asp.usatoday.com/weather/resources/climate/almanac-washington-dc.htm (accessed 1 April 2003).

[2] http://www.census.gov/acs/www/Products/Profiles/Single/2001/SS01/Narrative/040/NP04000US11.htm (accessed 1 April 2003).
[3] http://tinet.ita.doc.gov/view/f-2000-45-561/index.html (April 4 2003).
[4] Plant identification based on field observations, GIS tree identification map for Reservation No. 2, and survey provided by NPS.

EXISTING CONDITIONS



Figure 3-1. Poorly drained area south of Monument Lodge. (F-5)
(John Milner Associates, Inc., 2003)



Figure 3-2. Invasive winter honeysuckle around Sylvan Theatre. (E-10)
(John Milner Associates, Inc., 2003)



Figure 3-3. View of the Washington Monument from the Lincoln Memorial. (C-9)
(John Milner Associates, Inc., 2003)



Figure 3-4. Washington Monument from the southeast. (H-10)
(John Milner Associates, Inc., 2003)



Figure 3-5. Monument base. (B-22)
(John Milner Associates, Inc., 2003)



Figure 3-6. 14th Street and sidewalk, looking south. (L-24)
(John Milner Associates, Inc., 2003)



Figure 3-7. Monument Lodge, looking west across 15thStreet. (H-2)
(John Milner Associates, Inc., 2003)



Figure 3-8. Survey Lodge, looking north. (D-7)
(John Milner Associates, Inc., 2003)



Figure 3-9. Sylvan Theater facade. (D-23)
(John Milner Associates, Inc., 2003)



Figure 3-10. 16th Street oval parking lot with White House in the distance, looking north. (G-1)
(John Milner Associates, Inc., 2003)



Figure 3-11. German-American Friendship Garden, looking west. (G-13)
(John Milner Associates, Inc., 2003)



Figure 3-12. Constitution Avenue, looking east. (I-21)
(John Milner Associates, Inc., 2003)



Figure 3-13. Sidewalk along Constitution Avenue, looking east. (J-2)
(John Milner Associates, Inc., 2003)



Figure 3-14. Sidewalk along 14th Street, looking north. (L-21)
(John Milner Associates, Inc., 2003)



Figure 3-15. 17th Street, looking north. (I-3)
(John Milner Associates, Inc., 2003)



Figure 3-16. Sidewalk along Independence Avenue behind Sylvan Theatre, looking west. (N-15)
(John Milner Associates, Inc., 2003)



Figure 3-17. 15th Street with one Bulfinch gatepost in foreground, looking south. (J-20)
(John Milner Associates, Inc., 2003)



Figure 3-18. Sidewalk, bus tour kiosk, and bus drop-off at Jefferson Drive, looking west. (L-3)
(John Milner Associates, Inc., 2003)



Figure 3-19. Service drive at Survey Lodge, looking north. (C-15)
(John Milner Associates, Inc., 2003)



Figure 3-20. Cobblestone ditch along service drive, looking east. (C-18)
(John Milner Associates, Inc., 2003)



Figure 3-21. Entrance and exit at 16th Street oval parking lot, looking south. (G-24)
(John Milner Associates, Inc., 2003)



Figure 3-22. Flagpoles, floodlights, and paving at monument base, looking south. (A-17)
(John Milner Associates, Inc., 2003)



Figure 3-23. View of Capitol and Monument Lodge to the east, sidewalk in foreground. (A-9)
(John Milner Associates, Inc., 2003)



Figure 3-24. Sidewalk from north end of 15th Street to monument. (J-24)
(John Milner Associates, Inc., 2003)

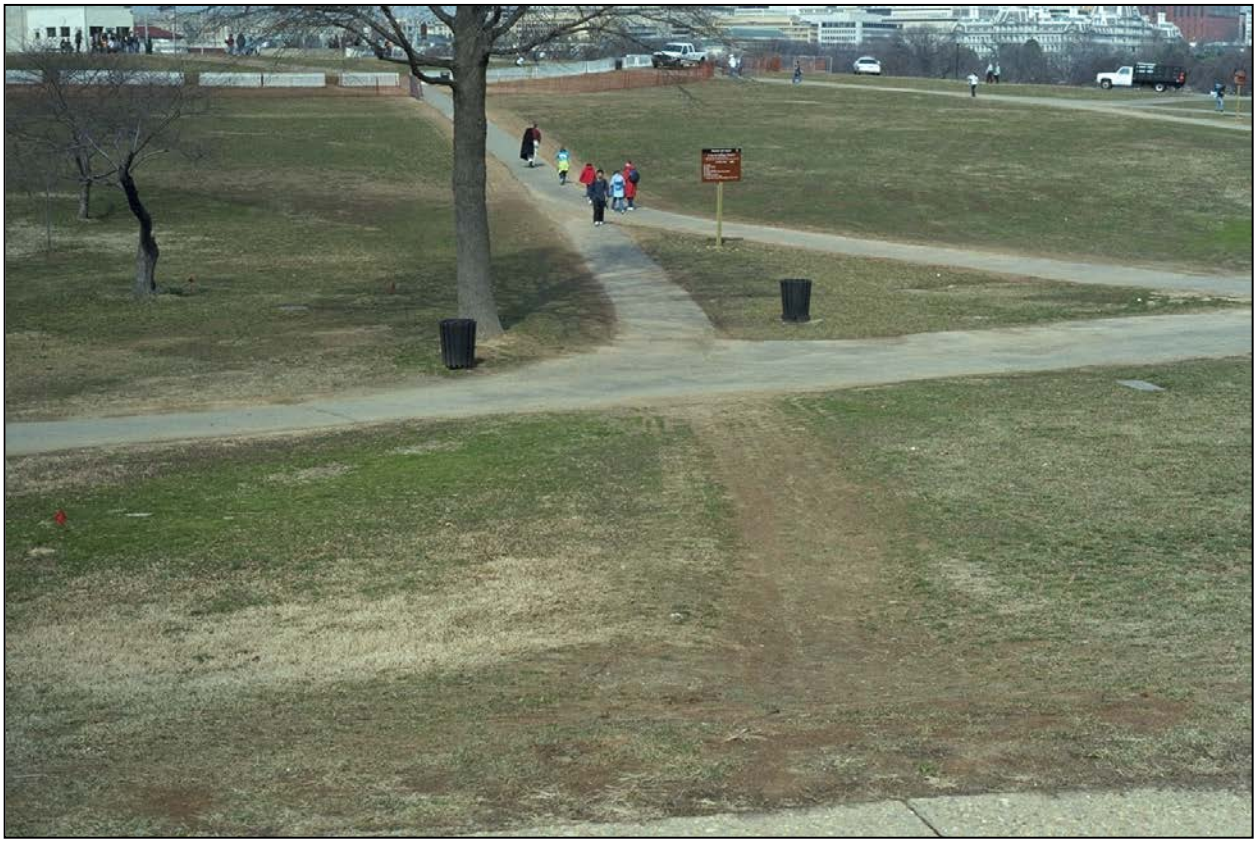


Figure 3-25. Desire path south of the Monument Lodge, looking northwest. (K-10)
(John Milner Associates, Inc., 2003)



Figure 3-26. Sidewalk from 17th Street to the monument, looking east. (I-6)
(John Milner Associates, Inc., 2003)



Figure 3-27. Sidewalk detour around trees, looking east. (B-20)
(John Milner Associates, Inc., 2003)



Figure 3-28. Vehicle gate crossing Jersey barriers around monument. (B-14)
(John Milner Associates, Inc., 2003)



Figure 3-29. View of monument from corner of 17th Street and Constitution Avenue. (J-1)
(John Milner Associates, Inc., 2003)



Figure 3-30. View of monument from corner of 14th Street and Constitution Avenue. (M-2)
(John Milner Associates, Inc., 2003)



Figure 3-31. Large cherry grove west of 16th Street parking lot, looking southwest. (G-21)
(John Milner Associates, Inc., 2003)



Figure 3-32. Large cherry grove west of 16th Street parking lot, looking southeast. (I-24)
(John Milner Associates, Inc., 2003)



Figure 3-33. Grove of oaks north of Monument Lodge, looking west. (L-17)
(John Milner Associates, Inc., 2003)



Figure 3-34. Grove of maples east of Survey Lodge, looking northwest. (N-19)
(John Milner Associates, Inc., 2003)



Figure 3-35. Open grove at 17th Street and Independence Avenue, looking northwest. (H-22)
(John Milner Associates, Inc., 2003)



Figure 3-36. Vegetation on the south side of Monument Lodge, looking northeast. (F-4)
(John Milner Associates, Inc., 2003)



Figure 3-37. Vegetation on north side of Monument Lodge, looking southeast. (H-1)
(John Milner Associates, Inc., 2003)



Figure 3-38. Rear of Monument Lodge, with hedges and canopy, looking east. (F-17)
(John Milner Associates, Inc., 2003)



Figure 3-39. Rear lawn of Survey Lodge, looking northeast. (C-16)
(John Milner Associates, Inc., 2003)



Figure 3-40. Sylvan Theater sidewalk and cherry grove, looking north. (E-9)
(John Milner Associates, Inc., 2003)



Figure 3-41. German-American Friendship Garden seating area, looking east. (G-14)
(John Milner Associates, Inc., 2003)



Figure 3-42. Washington Monument and surroundings, looking west. (H-9)
(John Milner Associates, Inc., 2003)



Figure 3-43. Washington Monument base and entry station, looking west. (O-13)
(John Milner Associates, Inc., 2003)



Figure 3-44. Sylvan Theater stage, looking southeast. (E-3)
(John Milner Associates, Inc., 2003)



Figure 3-45. Sylvan Theatre comfort station. (E-11)
(John Milner Associates, Inc., 2003)



Figure 3-46. 15th Street and Constitution Avenue with Bulfinch Gatepost, looking west. (M-6)
(John Milner Associates, Inc., 2003)



Figure 3-47. Bulfinch gatepost detail, looking north. (J-18)
(John Milner Associates, Inc., 2003)



Figure 3-48. Jefferson Pier detail, looking east. (B-17)
(John Milner Associates, Inc., 2003)



Figure 3-49. NPS ticket kiosk and surroundings, looking northeast. (F-21)
(John Milner Associates, Inc., 2003)



Figure 3-50. Light vault to the north of the monument, looking north. (C-5)
(John Milner Associates, Inc., 2003)



Figure 3-51. Flagpoles around plaza, with the White House in the distance, looking north. (A-4)
(John Milner Associates, Inc., 2003)



Figure 3-52. Monument spotlight and drinking fountain, looking east. (D-18)
(John Milner Associates, Inc., 2003)



Figure 3-53. "Twin Twenty" style streetlight at 15th Street, looking east. (F-24)
(John Milner Associates, Inc., 2003)



Figure 3-54. Rear of Sylvan Theatre with steps, ramp, and "Washington Globe" light. (E-18)
(John Milner Associates, Inc., 2003)



Figure 3-55. Sidewalk and "Olmsted" light standard along 14th Street, looking north. (L-11)
(John Milner Associates, Inc., 2003)



Figure 3-56. Cast iron and wood bench detail, looking northeast. (E-22)
(John Milner Associates, Inc., 2003)



Figure 3-57. Cast iron and recycled plastic bench detail, looking north. (A-16)
(John Milner Associates, Inc., 2003)



Figure 3-58. Dedication Plaque detail, looking west. (A-22)
(John Milner Associates, Inc., 2003)



Figure 3-59. 100th anniversary plaque detail. (I-5)
(John Milner Associates, Inc., 2003)



Figure 3-60. Washington granite interpretive panel detail, looking east. (F-14)
(John Milner Associates, Inc., 2003)



Figure 3-61. World War II Memorial interpretive sign along 17th Street, looking west. (I-7)
(John Milner Associates, Inc., 2003)



Figure 3-62. View from monument observation deck, looking east. (B-1)
(John Milner Associates, Inc., 2003)



Figure 3-63. View from monument observation deck, looking north. (B-3)
(John Milner Associates, Inc., 2003)



Figure 3-64. View from monument observation deck, looking west. (B-5)
(John Milner Associates, Inc., 2003)

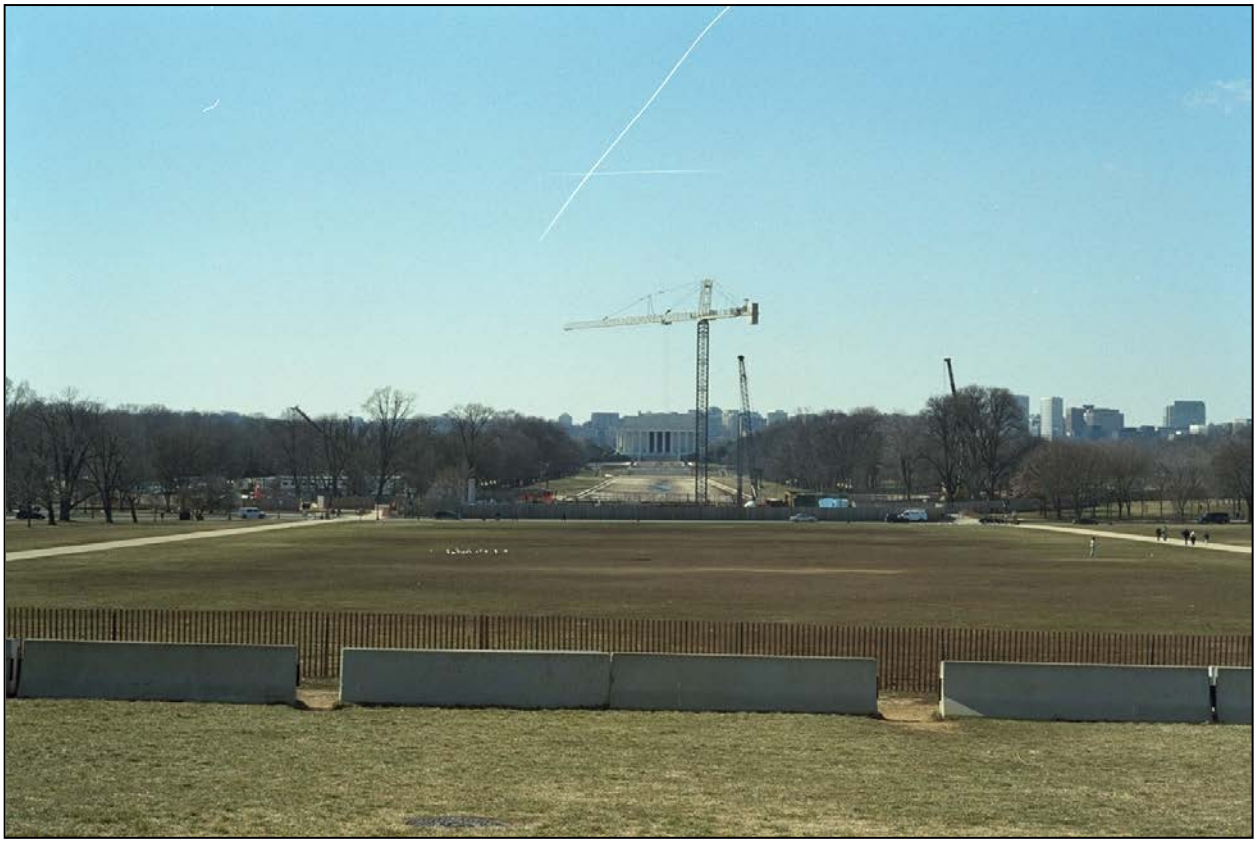


Figure 3-65. View west to Lincoln Memorial from Monument plaza. (A-1)
(John Milner Associates, Inc., 2003)



Figure 3-66. View south to Tidal Basin and Memorial Jefferson from Monument plaza. (A-5)
(John Milner Associates, Inc., 2003)



Figure 3-67. View from monument observation deck, looking south. (B-7)
(John Milner Associates, Inc., 2003)



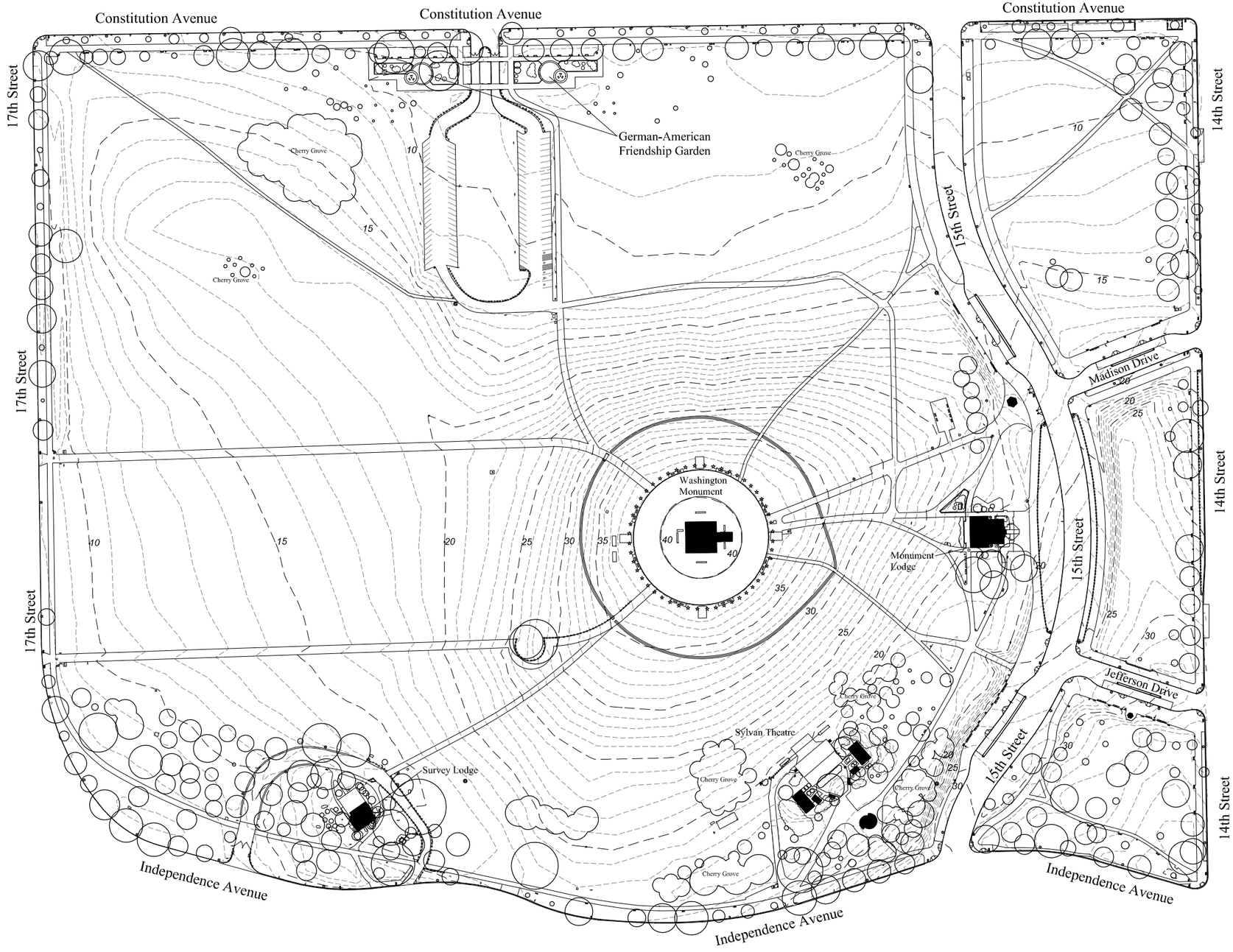
Figure 3-68. View west toward the monument from the Capitol Reflecting Pool. (C-10)
(John Milner Associates, Inc., 2003)



Figure 3-69. View south toward the monument from the Ellipse. (J-8)
(John Milner Associates, Inc., 2003)



Figure 3-70. View north of the Washington Monument from the Jefferson Memorial. (C-7)
(John Milner Associates, Inc., 2003)



Legend

- Building
- Contour
- Fence
- Jersey barriers
- Road
- Shrub
- Sidewalk
- Tree

N

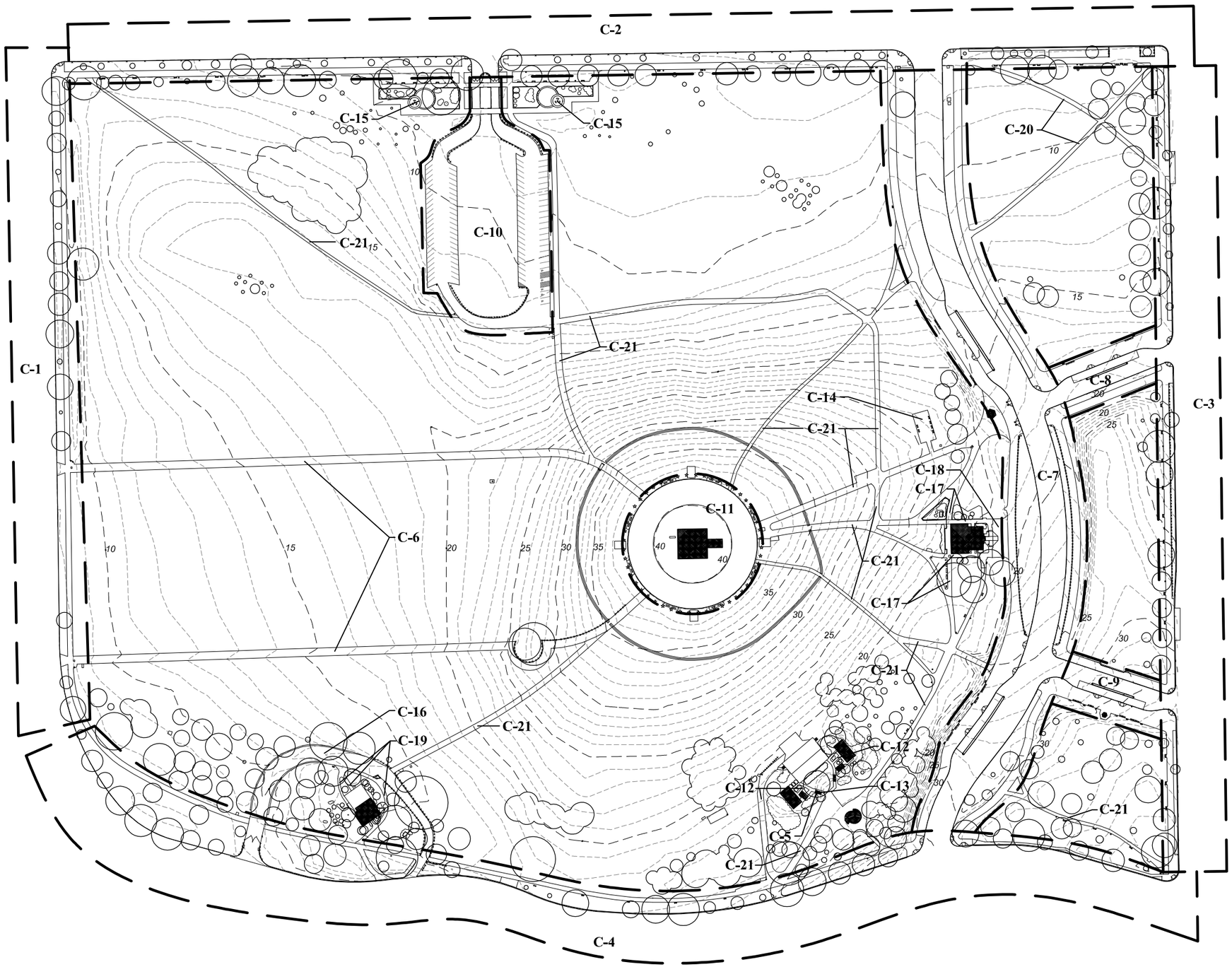
0 50 100 200 FEET

NPS Drawing No. 804/84492

Map 3-1

Existing Conditions

Washington Monument Grounds
Cultural Landscape Report
Washington, DC - National Park Service



Circulation

C-1 17th Street corridor, including sidewalks
C-2 Constitution Avenue corridor, including sidewalks
C-3 14th Street corridor, including sidewalks
C-4 Independence Avenue corridor, including sidewalks
C-5 Flagstone steps
C-6 Walks from Monument to 17th Street
C-7 15th Street corridor, including sidewalks, bus pull-offs
C-8 Madison Drive corridor, including sidewalks, bus pull-offs
C-9 Jefferson Drive corridor, including sidewalks, bus pull-offs
C-10 16th Street oval parking lot and drive
C-11 Monument Plaza
C-12 Walks at Sylvan Theatre
C-13 Ramp
C-14 Queuing area, Bicentennial development
C-15 Walks within German-American Friendship Garden
C-16 Oval service drive at Survey Lodge
C-17 Walks at Monument Lodge
C-18 Terrace at Monument Lodge
C-19 Walks at Survey Lodge
C-20 Concrete sidewalk
C-21 Asphalt path

Legend

- Building
- Contour
- Fence
- Jersey barriers
- Road
- Shrub
- Sidewalk
- Tree

N

0 50 100 200 Feet

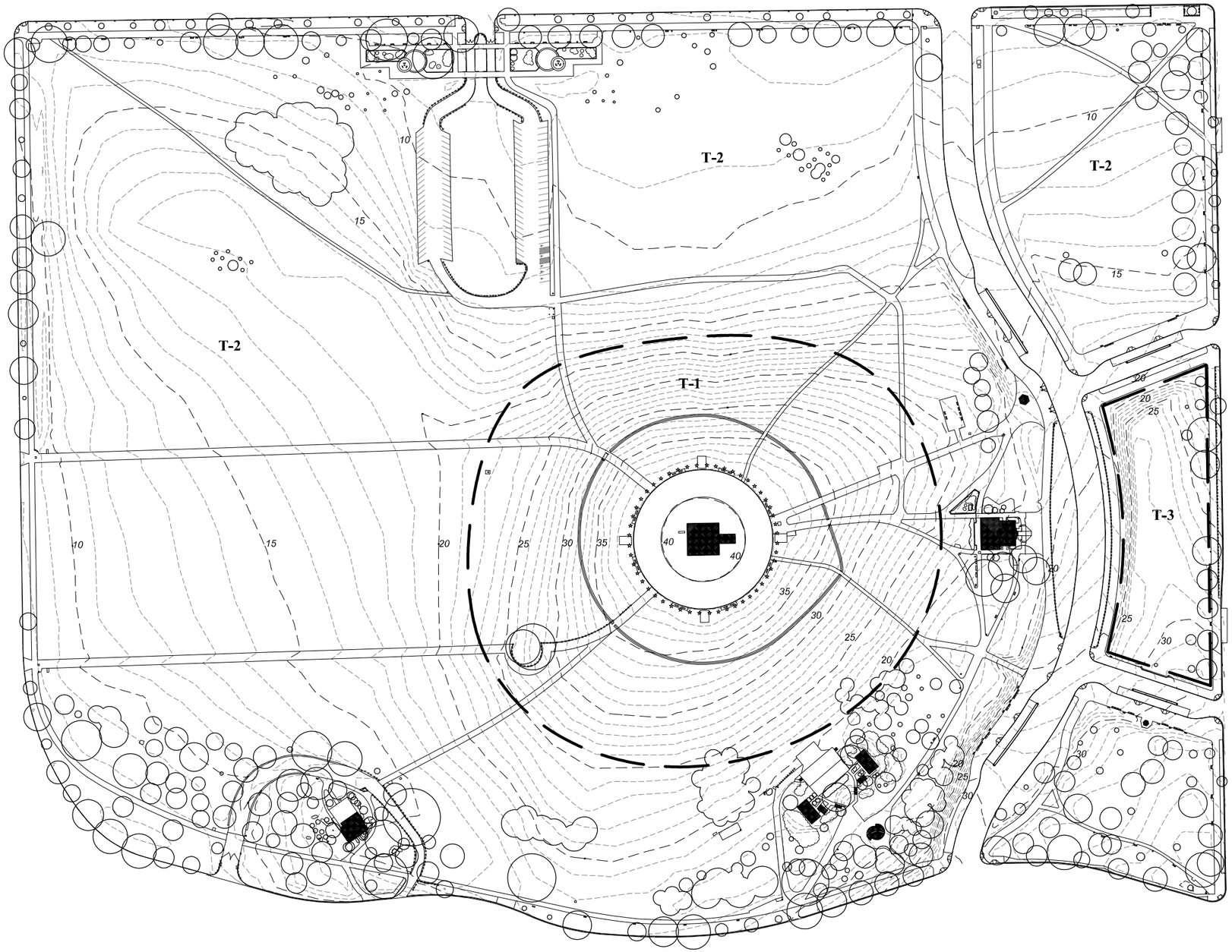
NPS Drawing No. 804/84492

Map 3-2

Existing Conditions

Circulation

Washington Monument Grounds
Cultural Landscape Report
Washington, DC - National Park Service



Topography

T-1 Monument knoll
T-2 Level open ground
T-3 Berm

Legend

- Building
- Contour
- Fence
- Jersey barriers
- Road
- Shrub
- Sidewalk
- Tree

N

0 50 100 200 Feet

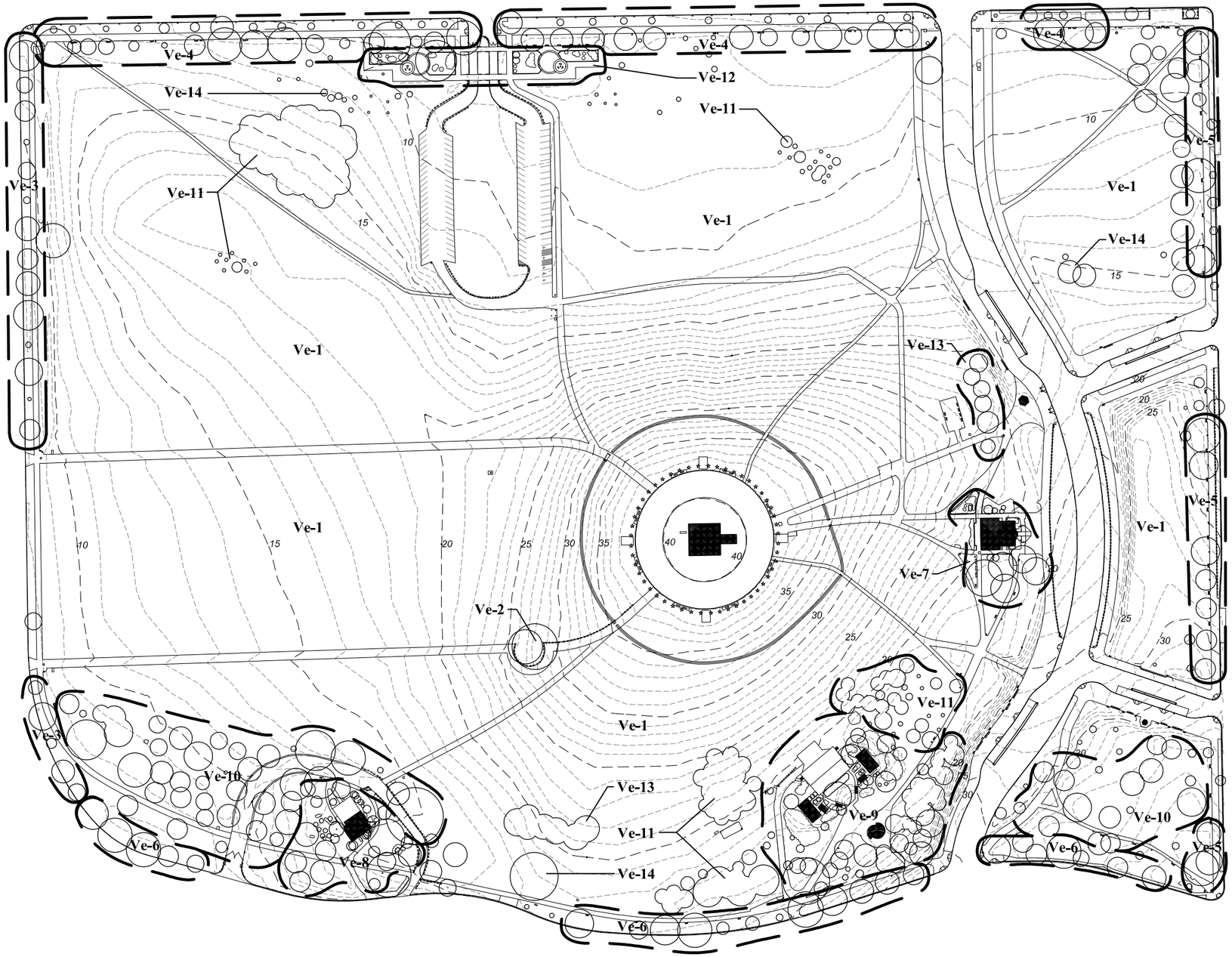
NPS Drawing No. 804/84492

Map 3-3

Existing Conditions

Topography

Washington Monument Grounds
Cultural Landscape Report
Washington, DC - National Park Service



Vegetation

Ve-1 Lawn
Ve-2 Large mulberry trees
Ve-3 Street trees along 17th Street
Ve-4 Street trees along Constitution Avenue
Ve-5 Street trees along 14th Street
Ve-6 Street trees along Independence Avenue
Ve-7 Monument Lodge plantings
Ve-8 Survey Lodge plantings
Ve-9 Sylvan Theatre plantings
Ve-10 Open grove
Ve-11 Cherry grove
Ve-12 German-American Friendship Garden plantings
Ve-13 Line of trees (2)
Ve-14 Individual trees

Legend

- Building
- Contour
- Fence
- Jersey barriers
- Road
- Shrub
- Sidewalk
- Tree

N

0 50 100 200 Feet

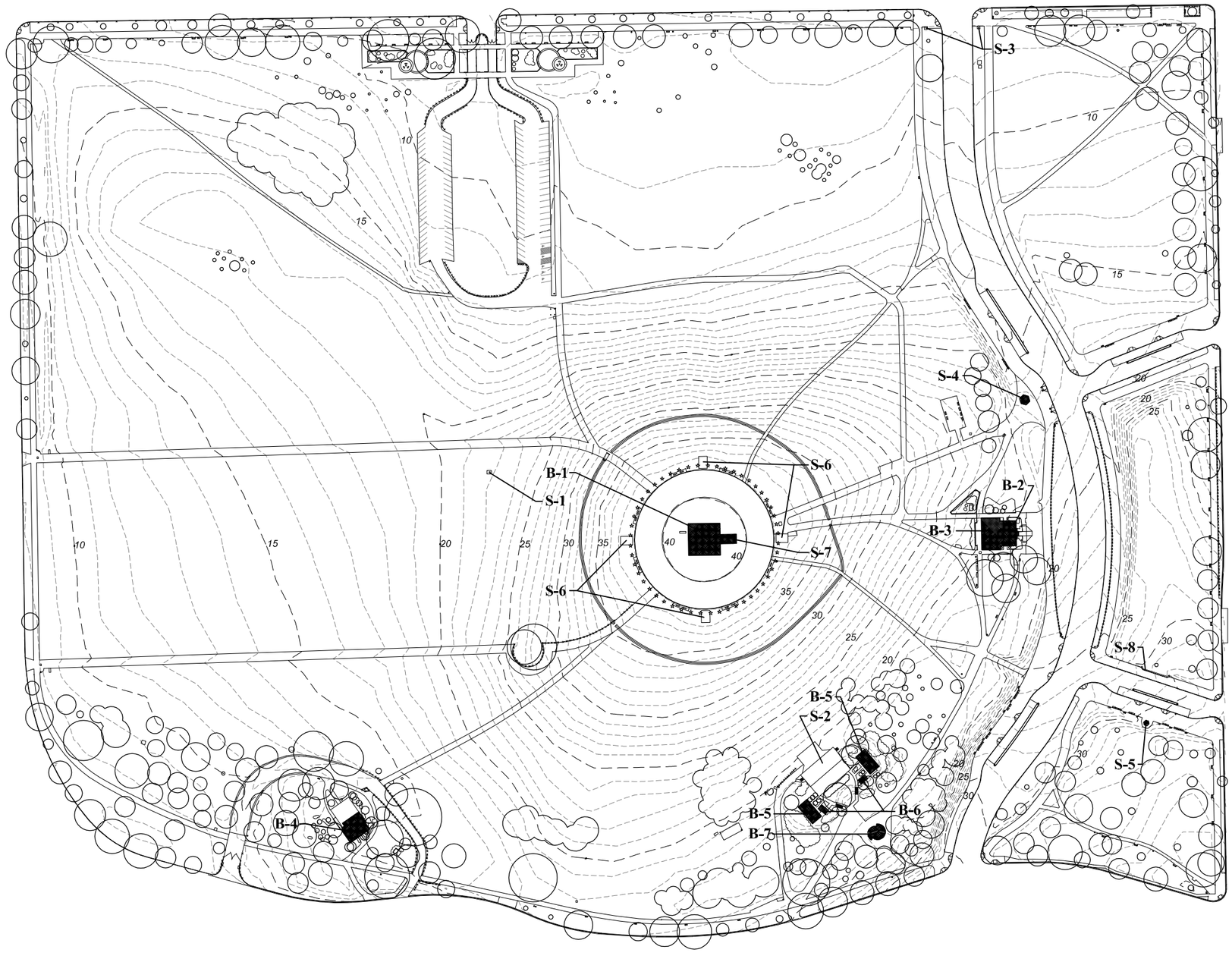
NPS Drawing No. 804/84492

Map 3-4

Existing Conditions

Vegetation

Washington Monument Grounds
Cultural Landscape Report
Washington, DC - National Park Service



Buildings & Structures

B-1 Washington Monument
B-2 Monument Lodge
B-3 Monument Lodge addition
B-4 Survey Lodge
B-5 Sylvan Theatre dressing rooms
B-6 Sylvan Theatre sheds
B-7 Comfort station

S-1 Jefferson Pier survey marker
S-2 Sylvan Theatre stage
S-3 Bulfinch gateposts (2)
S-4 Ticket kiosk
S-5 Bus tour kiosk
S-6 Light vaults
S-7 Monument entry station
S-8 Granite retaining wall

Legend

- Building
- Contour
- Fence
- Jersey barriers
- Road
- Shrub
- Sidewalk
- Tree

N

0 50 100 200 Feet

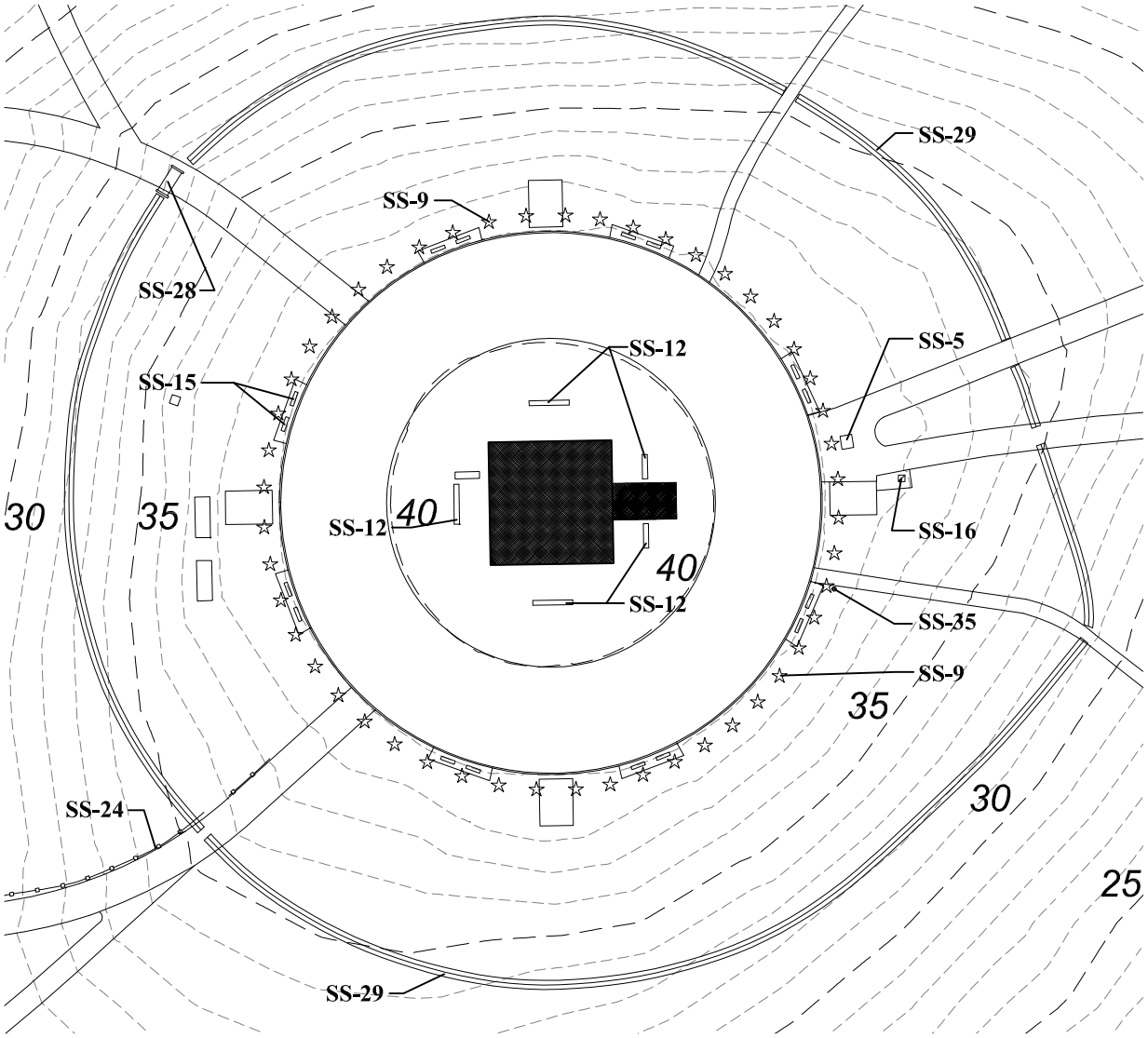
NPS Drawing No. 804/84492

Map 3-5

Existing Conditions

Buildings & Structures

Washington Monument Grounds
Cultural Landscape Report
Washington, DC - National Park Service



Small Scale Features

SS-5 Dedication plaque
SS-9 Ring of flagpoles
SS-12 Monument floodlight
SS-15 Benches*
SS-16 Drinking fountain
SS-24 Post and chain fencing
SS-28 Hydraulic vehicle access gate
SS-29 Jersey barriers
SS-35 Trash receptacle*

* representative

Legend

- Bench
- Building
- Contour
- Drinking fountain
- Post and chain fencing
- Flag pole
- Jersey barriers
- Sidewalk
- Trash receptacle

N

0 20 40 80 Feet

NPS Drawing No. 804/84492

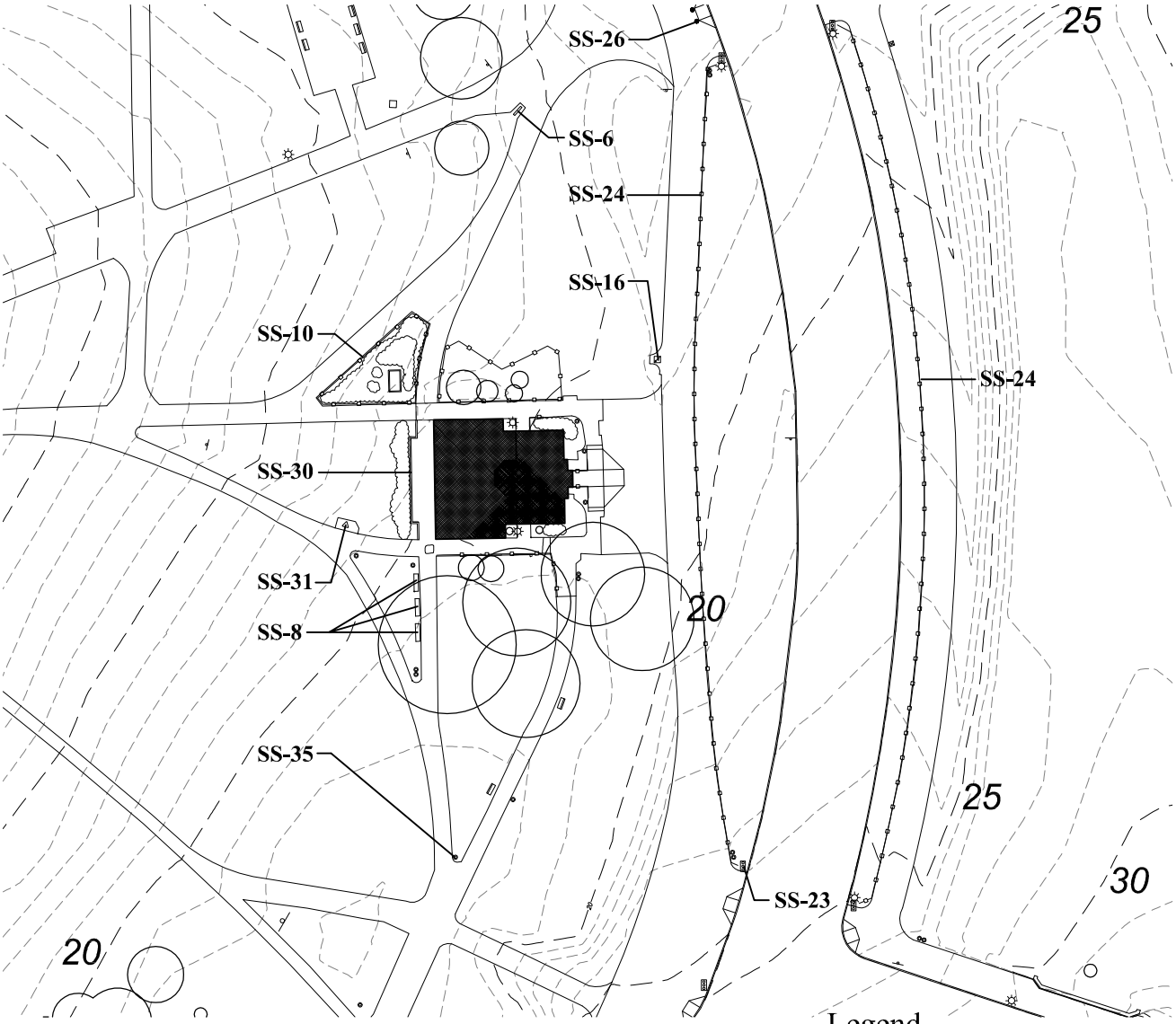
Map 3-6

Existing Conditions

Small-scale Features:

Monument Plaza

Washington Monument Grounds
Cultural Landscape Report
Washington, DC - National Park Service



Small Scale Features

SS-6 George Washington granite panel
SS-8 Concrete and wood slat backless benches
SS-10 Cast iron fencing
SS-16 Drinking fountain*
SS-23 Traffic light*
SS-24 Post and chain fencing
SS-26 Bollard*
SS-30 Handrail
SS-31 Pedestal telephone
SS-35 Trash receptacle*

* representative

Legend

- Bench
- Bollard
- Building
- Contour
- Drinking fountain
- Fence post
- Light pole
- Road
- Shrub
- Sidewalk
- Sign
- Telephone stand
- Traffic light
- Trash receptacle
- Tree

N

0 20 40 80 Feet

NPS Drawing No. 804/84492

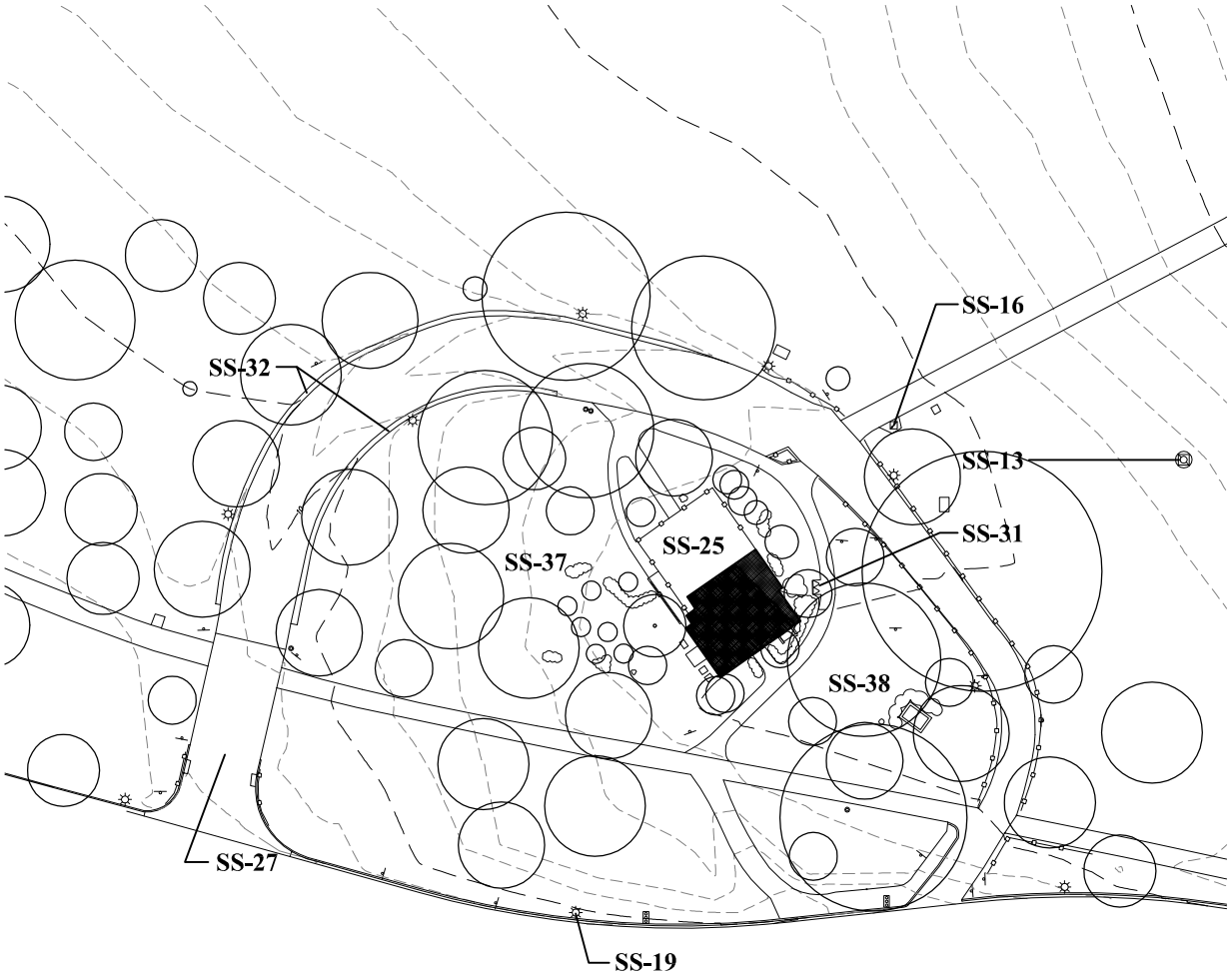
Map 3-7

Existing Conditions

Small-scale Features:

Monument Lodge

Washington Monument Grounds
Cultural Landscape Report
Washington, DC - National Park Service



Small Scale Features

SS-2 Twin twenty double lamp streetlight*
SS-13 Monument spotlight
SS-16 Drinking fountain*
SS-25 Wooden board fence
SS-27 Gate
SS-31 Pedestal telephone*
SS-32 Stone-lined drainage ditch
SS-37 Picnic tables
SS-38 Bike rack

* representative

Legend

- Bollard
- Building
- Contour
- Drinking fountain
- Fence post
- Light pole
- Road
- Shrub
- Sidewalk
- Sign
- Spotlight
- Telephone stand
- Traffic light
- Trash receptacle
- Tree

N

0 20 40 80 Feet

NPS Drawing No. 804/84492

Map 3-8

Existing Conditions

Small-scale Features: Survey Lodge

Washington Monument Grounds
Cultural Landscape Report
Washington, DC - National Park Service



Small Scale Features

SS-7 Bench*
SS-16 Drinking fountain*
SS-20 Traffic signage*
SS-35 Trash receptacle*

* representative

Legend

- Bench
- Building
- Contour
- Drinking fountain
- Fence post
- Light pole
- Road
- Shrub
- Sidewalk
- Sign
- Spotlight
- Traffic light
- Trash receptacle
- Tree

N

0 20 40 80 Feet

NPS Drawing No. 804/84492

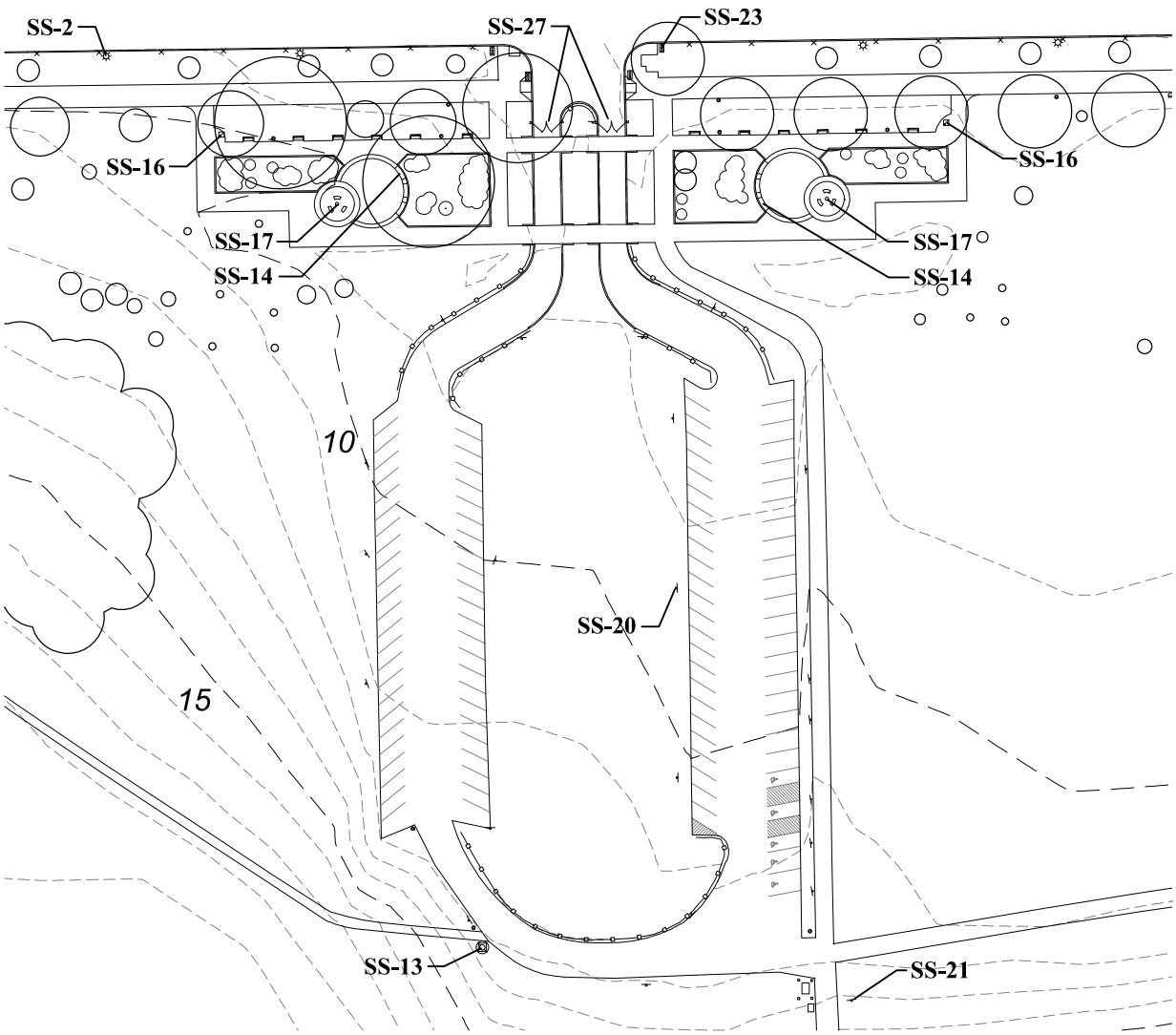
Map 3-9

Existing Conditions

Small-scale Features:

Sylvan Theatre

Washington Monument Grounds
Cultural Landscape Report
Washington, DC - National Park Service



Small Scale Features

SS-2 Twin twenty double lamp streetlight*
SS-13 Monument spotlight
SS-14 Stone benches
SS-16 Drinking fountain*
SS-17 Fountain
SS-20 Traffic signage*
SS-21 Regulatory signage*
SS-23 Traffic light*
SS-27 Gates

* representative

N

0 25 50 100 Feet

Legend

- Bench
- Contour
- Drinking fountain
- Fence post
- Light pole
- Road
- Shrub
- Sidewalk
- Sign
- Spotlight
- Traffic light
- Trash receptacle
- Tree

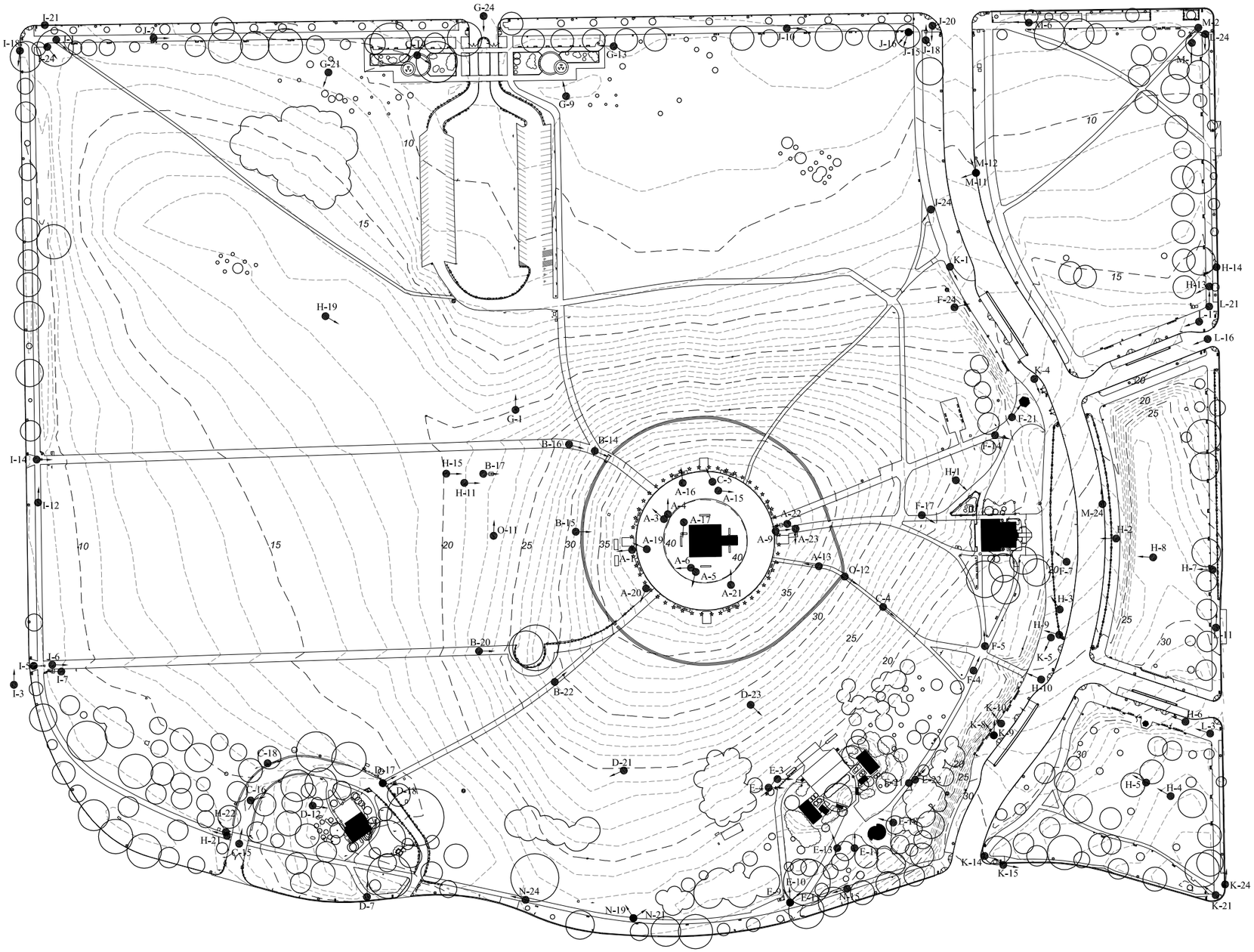
NPS Drawing No. 804/84492

Map 3-10

Existing Conditions

Small-scale Features: German-American Friendship Garden

Washington Monument Grounds
Cultural Landscape Report
Washington, DC - National Park Service



Legend

- Building
- Contour
- Fence
- Jersey barriers
- Photo station point
- Road
- Shrub
- Sidewalk
- Tree

N

0 50 100 200 FEET

K-21 Letter = film roll; no. = frame

NPS Drawing No. 804 / 84492

Map 3-11

Photographic Station Points

Overall Site

Washington Monument Grounds
Cultural Landscape Report
Washington, DC - National Park Service

Chapter Four

Analysis and Evaluation

CHAPTER FOUR

ANALYSIS AND EVALUATION

INTRODUCTION

This chapter is comprised of a comparative analysis of historic and existing landscape conditions. The narrative that follows compares the existing cultural landscape associated with the Washington Monument Grounds to the landscapes that surrounded the monument during earlier periods of its history, particularly the site's National Register period of significance, ca. 1791-1943. The years spanning the period of the monument's construction and the development of the grounds as a public park (1848-1889) and the period during which the monument and grounds became the central feature in a cross-axial plan connecting the monument with the White House to the north, the Capitol to the east, the Jefferson Memorial to the south, and the Lincoln Memorial to the west (1889-1943) are the primary focus of the comparative analysis.

This analysis looks at the trends and events associated with each of these sub-periods and compares the character of the landscape to the present. The analysis also considers how use of the landscape has evolved over time. Even before its completion, the monument became a symbol of American values and ideals, and it soon thereafter began to serve as a backdrop for national events, from mourning the death of Abraham Lincoln to celebrating the 4th of July. In more recent years, the monument grounds, Lincoln Memorial, and National Mall have served as gathering places for expressing support for social causes. The analysis suggests how and why the monument has taken on this role.

Many significant elements of the monument's past cultural landscape survive in the present. The monument remains as beautiful and commanding a presence as when first constructed. It nearly occupies the spot envisioned by Pierre L'Enfant in 1791 for a monument honoring the nation's first president and remains the classical obelisk first imagined by Robert Mills in the 1830s and perfected by George P. Marsh and Lt. Col. Thomas Casey in the 1880s. The grounds continue to feature a formal, tree-lined border with breaks to allow visual connections to the important buildings and monuments that terminate the cross-axial design reinforced by the McMillan Plan in the early 20th century. The most prominent feature of this landscape is the grass-covered knoll beneath the monument. Roadways once encircled the mound, and cars were able to approach the base of the monument as late as 1960. The knoll has otherwise remained open and accessible *(comparative photographs: figures 4-9a and 4-9b, 4-15a and 4-15b).* The low grass turf that characterizes the majority of the site dramatically sets off the masonry obelisk, and the associated open ground continues to accommodate gatherings of thousands of visitors. A 1910 law ensures the monument will always be the tallest structure in the District, and it dominates the city's skyline and anchors the National Mall area. It hosts visitors from all over the world, while throngs of local and regional residents enjoy the grounds on weekends and sunny afternoons.

The Washington Monument Grounds is a commemorative feature honoring George Washington, an icon of the District of Columbia and a symbol of democracy.

LANDSCAPE ANALYSIS METHODOLOGY

To better understand the relationship between the Washington Monument Grounds project area as it appears today and its character during the period of significance, this chapter includes a comparative analysis of historic and existing conditions. The purpose of this analysis is to identify and assess to what degree significant historic features and systems survive today, indicate what is known about the origin of extant resources, and identify known missing features. Lists of features contributing to the period of significance, as well as non-contributing and undetermined features, follow each section. The three primary goals in preparing this comparative analysis are:

1) to understand which features, if any, contribute to the period of significance;

2) to establish the basis for an integrity evaluation that assesses the degree to which the extant landscape resembles the landscape during the period of significance; and

3) to provide an understanding of the similarities and differences between historic and existing conditions that might support future treatment recommendations for the cultural landscape.

The analysis is organized according to the landscape characteristics used in Chapter Three to present existing conditions documentation information:

- natural systems;
- spatial organization;
- land use;
- topography;
- circulation;
- vegetation;
- buildings and structures;
- constructed water features;
- small-scale features; and
- views and vistas.

CONTRIBUTING AND NON-CONTRIBUTING RESOURCES

One of the byproducts of the comparative analysis is an inventory of resources that survive from the period of significance. These are referred to as contributing features. Resources that originated after the period of significance are identified as non-contributing. Features known to have existed during previous periods of the park's history, but are no longer extant, are listed as missing resources. A table at the end of each landscape characteristic section provides a listing of the contributing and non-contributing resources associated with each of the landscape characteristics inventoried on the Washington Monument Grounds in Chapter Three. Contributing features are illustrated on a map at the end of this chapter (*map 4-1*).

COMPARATIVE ANALYSIS OF HISTORIC AND EXISTING LANDSCAPE CHARACTERISTICS

NATURAL SYSTEMS

Waterways originally bordered the monument grounds to the west and south. The monument was initially constructed on a small knoll edged on three sides by waterways and tidal wetlands. This early arrangement is depicted on the 1851 Keily survey map *(figure 2-3*). Tiber Creek, which emptied into the Potomac, ran diagonally along the northwestern corner of the grounds; a natural tidal wetland associated with the Potomac River—the Potomac Flats—ran along the south side.

A lake and two ponds, discussed in more detail in the below section, "Constructed Water Features," were created on the monument grounds as flood control measures in the 1870s. Natural springs and the Potomac River fed these water bodies that occupied the northwestern corner of the grounds by 1873. These were later filled. The Potomac Flats were also filled during the 19th century, resulting in a larger area of parkland. The existing landscape continues to reflect these efforts today. The existing graded, manicured landscape has evolved dramatically from that associated with monument during its early phase of construction. The site today contains little evidence of the natural systems and features that existed prior to the 20th century. The current landform was completed by 1943 and constitutes a contributing resource (see "Topography" section below for more information).

The Mound

The high point used to site the monument in 1848 was not located precisely along the proposed axis of the monumental core between the Capitol and White House, or in the exact location L'Enfant envisioned for a statue honoring the first president. Robert Mills, the engineer who designed the original obelisk, did not believe the marshy ground that occupied the desired position would support the monument's weight, and chose instead an elevated spot 370 feet to the east and 123 feet south. This knoll has also been augmented over time as part of the development of the monument grounds. In 1880, a steep earthen embankment—thirty feet wide and seventeen feet above the grade of the surrounding landscape—was added to the site. By 1889, the embankment was expanded to an area 175 feet by 220 feet wide, and extensive amounts of fill had been added to the site to help stabilize the monument.

Tiber Creek and the Potomac River

The alignments and shorelines of Tiber Creek and the Potomac River have shifted and changed in many ways since 1791 due to both natural forces, such as flooding, and human intervention, such as cutting and filling. Between the 1790s and 1815, Tiber Creek was straightened and channeled into the Washington Canal and its mouth at the Potomac River manipulated to form a basin connecting the C&O and Washington Canals. In the 1860s and 1870s, the District of Columbia, particularly the lowlands including the monument grounds, were plagued by problems caused by the rising and falling of the Potomac River and the siltation of its floodplain *(figure 2-8).* Eventually the canal was culverted and the area regraded for flood control. Continued

flooding problems led to the filling of the flats by the U.S. Army Corps of Engineers between 1882 and 1897, which changed the shoreline to the form that it possesses today.

In the 1870s, water from the Potomac was diverted into a lake and two ponds constructed in the northwestern quadrant of the grounds. In addition to their role as a flood control measure, these ponds were used to raise fish *(figures 2-9, 2-34)*. Water entered Babcock Lake, the largest of these water bodies, through an 800-foot-long, 4-inch-diameter pipe that ran from 14th Street to "nearly opposite" the monument; another pipe fed a fountain in the middle of the lake.[1] This lake was filled with earth in 1887 due to fears that it was destabilizing the monument's foundations. The other two ponds were filled in in 1910. Not surprisingly, poor drainage characterizes portions of the Washington Monument site north and west of the monument today, the only indication of the former presence of these water bodies. Drains and an underground stormwater system currently control surface site drainage. Heavy usage associated with public gatherings and informal recreation still causes a good deal of erosion within the site due to the tendency of the soils to become saturated *(figure 3-1)*.

The Potomac Flats

The area that became known as the Potomac Flats was created by siltation of the floodplain along the shoreline of the Potomac River. Dredging of the Potomac, proposed as early as 1833, was not conducted until 1881 after a winter ice dam formed on the river, causing severe flooding in the city.[2] The dredge material was used to fill the tidal flats west and south of the monument grounds, eventually forming East and West Potomac Parks, with the Tidal Basin located between the two *(figure 2-39)*.

SPATIAL ORGANIZATION

The 555-foot-tall obelisk has always provided the central focus for the spatial organization of the monument grounds. Since initial construction began in 1848, the obelisk has occupied the central graded knoll that covers its tiered foundation. The mound, which has been augmented over time, remains one of the primary features of the landscape. Street trees along the boundaries have provided a sense of enclosure around the grounds' open sweep of lawn. At the same time, the emphasis on axial relationships to structures beyond the grounds introduced by the McMillan Plan in the early 20th century made visual connections part of the spatial organization. The elevated position of the monument as the center point of the cross-axis, and its visibility, accentuated by its setting and dramatic beauty, contributed to the success of the McMillan Plan during the early 20th century and continues to render the Washington Monument one of the most important symbolic structures in the American cultural landscape. In the words of Carol B. Thompson, State Historic Preservation Officer for the District of Columbia in 1986, "The Washington Monument is of transcendent importance in American history and culture. The monument grounds are an integral visual part of the monument. The powerful monolith is brilliantly set off by an expansive, unobstructed grassy knoll which complements the scale of the monument, its location on the National Mall, and the symbolism of the monument as a national meeting ground."[3]

All the patterns of spatial organization described in the existing conditions chapter of the CLR, including the monument plaza, the mound, the flats, the sylvan areas, and the axes, survive from the period of significance and contribute to the significant historic character of the project area. The elements that comprise these areas are described individually below.

The Plaza

When the Washington Monument Grounds opened to the public in 1889, the monument and knoll and its circular paved plaza, defined the center of the site. The plaza has undergone various changes in material, dimensions, and accessibility. The existence of a paved plaza at the base of the monument dates to 1887. At that time, the plaza was a ten-foot-wide apron of stone at the base of the monument. In 1888-89, the plaza was extended to cover a circular area, with a seventy-foot radius. The plaza sat approximately 17 feet above the base of the mound below. The plaza included a roadway component that encircled the plaza and remained in use until 1961. The plaza today restricts vehicles, and is 120 feet in diameter. Flags have been placed around the plaza at the base of the Washington Monument since the 1920s. The earliest examples were raised temporarily for special events. The existing permanent flagpole arrangement was not established until 1957 *(figure 2-75)*. The flagpoles reinforce the sense of space associated with the central plaza around the monument. The sense of center associated with the plaza is accentuated by the many walks leading to the plaza from all directions *(comparative photographs: figures 4-20a and 4-20b)*.

The Mound

The mound that extends around the plaza on all sides is oval in shape. It extends over a high point of ground that existed prior to construction of the Washington Monument that has been accentuated over time through the use of fill. It provides the monument with a dramatic base, and is also part of the engineering solution for stabilizing the foundations of the obelisk. In 1854, when construction work on the Washington Monument was ceased temporarily, the monument stood on a small steeply-sided knoll. By 1885 when the monument was dedicated, it had a broad terrace as a base, set atop a 17-foot mound. The mound was expanded to 175 feet at the apex by 220 feet at the base in 1881, and again in 1889 to stabilize the monument's massive foundation, when it acquired its current configuration. The mound has been incorporated into site circulation since the monument grounds were improved in ca. 1888-89. At that time, the monument's sense of center was enhanced by a system of curvilinear carriageways that swept gracefully around the mound's base *(figures 2-28 and 2-38)*. The mound today provides a vantage point for visitors to see the connections between the monument grounds and the Capitol, White House, Lincoln Memorial, and Jefferson Memorial and serves as an appropriately-scaled base for views of the monument *(figures 3-3, 3-65, 3-66, 3-68, 3-69, and 3-70)*.

The Flats

Relatively level terrain edges the mound to the north and west. This terrain has generally been formed by fill. Until the late 19th century, marshland, stream corridors, and tidal creeks rendered much of the western portion of the monument grounds unoccupiable. In the 1870s the grounds were graded and fill was added to various areas of the grounds. Additional grading was

undertaken in the northern portion of the grounds in the 1890s. In the 1930s, the grounds west of the monument were leveled. Today, these manipulations of the ground appear natural: the gently sloping, level, grassy grade of the site is relatively uniform, stretching from the knoll out to the tree-lined boundary streets *(comparative photographs: figures 4-12a and 4-12b)*. This is the open ground that has served as popular recreational and public gathering space for many years.

Sylvan Areas

Closely spaced trees edged the perimeter roadways and are placed in groves in various locations around the edges of the monument grounds. Plantings are associated with the Monument and Survey Lodges, which are sited within the bands of sylvan groves, reinforcing a pattern of woodland edging that frames the open areas of the flats within. Tree-lined perimeter streets frame the Washington Monument Grounds on all four sides. These perimeter streets and avenues form the boundaries of the project area. These roads were established during the period of significance, as were various street tree plantings. Some of the groves that currently exist on the site appear to survive from the period of significance. Others, such as the cherry tree groves, appear to post-date the period of significance and do not contribute to the historic significance of the monument grounds.

Axes

Since the implementation of the McMillan Plan, the monument grounds have been viewed as the center point of a cross-axial plan that extends east to the Capitol, north to the White House, west to the Lincoln Memorial, and south to the Jefferson Memorial. Despite heavily trafficked external circulation corridors that form the boundaries of the monument area, the grounds are also perceived as the central node of the larger monumental core of the nation's capital.

The Washington Monument was originally designed to terminate the Mall area's western margin, balancing the U.S. Capitol at its eastern terminus. Linear visual connections were also made or maintained early on to the White House to the north. In 1922, the Lincoln Memorial was completed in its site along the U.S. Capitol axis, while the Jefferson Memorial completed the axis to the south in 1943 *(figures 3-62, 3-63, 3-64 and 3-67)*.

The internal boundaries of the Mall are porous enough to allow visual and physical continuity across its length. The central position of the Washington Monument within this cross-axis contributes to its importance as an American symbol of democracy.

LAND USE AND ACTIVITIES

From its earliest conception to the present, the Washington Monument Grounds has been first and foremost a commemorative site. The association of the grounds with the nation's first president has made it a destination for visitors, and the open landscape around the base of the monument accommodates large crowds on many occasions. Although the site has served different purposes—from cattle grazing to public swimming—at various points in its history, its original commemorative and public open space functions survive from the 19th century. Other contributing land uses include public gathering and visitor services.

Commemorative Land Uses

Since 1791, the design intent for the Washington Monument Grounds has been to establish a monument to honor the first president of the United States. The Washington National Monument Society was formed in 1833 to oversee the creation of an appropriate memorial to George Washington. Although not completed until 1884, the monument quickly captured national attention and has been a popular commemorative icon ever since.

The Washington Monument Grounds have also long served as a place for commemorative events and activities. For example when Abraham Lincoln died, a ceremony was held on the site, and when Charles Lindbergh returned from the first trans-Atlantic flight in 1927, thousands gathered on the grounds to rejoice *(figures 2-44 and 2-45).* Independence Day began to be celebrated on the grounds before the monument's completion, and it continues to be celebrated annually on the grounds and the adjacent Mall today *(figure 2-69).*

Recreational Land Uses

Throughout the late 19th and 20th centuries, the Washington Monument Grounds have been heavily used for public recreation. Although none of the specific recreational structures established during the period of significance survive, the grounds themselves continue to support formal and informal sports and recreational activities.

Recreation first became a part of the land use associated with the Washington Monument Grounds in 1872 when tree-lined, curving gravel roads were established through the grounds, and visitors began to enjoy leisurely carriage drives. Active recreation became a part of the site in the early 20th century. One of the earliest recreation features on the grounds was established when the existing fish ponds were converted for public swimming in 1907. Between 1907 and 1942, a variety of recreational facilities existed in the northwestern part of the grounds. These included swimming pools; a boat house and bath houses; tennis and basketball courts; baseball, softball, football, and soccer fields; an archery range; and even a small golf course *(figures 2-42, 2-64; figure 4-7; and comparative photographs: figures 4-11a and 4-11b).* These features were built largely on the land reclaimed from ponds constructed for flood control. These facilities were mostly removed in 1936. Recreational activities were subsequently relocated to the more expansive East and West Potomac Parks nearby. Although none of these constructed recreational features survive today, the grounds continue to host formal team sports such as kickball and softball, and informal sports such as frisbee, as well as jogging, dog-walking, kite-flying, and other activities that utilize the expansive lawns and park setting of the grounds *(figure 2-83).* Recreational uses continue to account for much of the site's visitation.

Other recreational uses included the use of the obelisk to screen movies and presentations of plays and music events at the Sylvan Theatre. Movies were first shown at the monument in 1916; public film screenings were recently reintroduced on the grounds with the "Screen on the Green" Monday night vintage movie series on the grounds. The Sylvan Theatre was opened on the grounds in 1917 *(figure 2-43).* It continues to be used today. Finally, large, organized assemblies have also taken place on the grounds: for instance, the Boy Scouts of America held their annual

jamboree there in 1937 *(figure 4-1)*. Temporary facilities have regularly been set up on the grounds to accommodate such activities.

Public Gathering Land Uses

The Washington Monument Grounds have long served as a focal point for public gathering; this use continues today and contributes to the historic significance of the site. By the 1920s, groups had begun holding rallies and events on the grounds as well as throughout the monumental core. In the 1960s, rallies held on the Mall included such notable events as the 1963 civil rights march in which Martin Luther King delivered his "I Have a Dream" speech in front of the Lincoln Memorial *(figure 2-77)*. The 1970s witnessed an era of protest. In 1973, a massive anti-Vietnam War march was held in the District, including on the Washington Monument Grounds. Since the 1970s, the causes championed on the Mall area have continued to expand. In 1995, the National Mall area was the backdrop for the Million Man March. The grounds have also been used by demonstrators and continue to serve this purpose, including recent demonstrations protesting a possible war in Iraq in March 2003.

Visitor Services Land Uses

Visitor services have been associated with the monument grounds since the late 19th century. This use has continued to the present and contributes to the historic significance of the property. By 1855, the grounds included a reception room. In 1888-89 a new building—the Monument Lodge—was added for the comfort of the visiting public. Many other resources and facilities that support the comfort and edification of visitors post-date the period of significance. These include public rest rooms, drinking fountains, concessions for food, books, and souvenirs, and security.

Missing Land Uses

From time to time, military uses have temporarily occupied the Washington Monument Grounds and other portions of the Mall area. During the Civil War, buildings including stables, quarters, a mess for officers and men, and a civilian bunkhouse were erected on the grounds. In 1887, a National Drill encampment took place on the site *(figure 2-25)*. During World War I, temporary government buildings supporting the war effort were constructed nearby along the north side of the Reflecting Pool. Similar structures were built on the monument grounds during World War II *(figures 2-57, 2-60, 2-68, and 2-72)*. These features have since been removed, but photographs and plans from the period suggest that the buildings covered the entire western portion of the site between 16th and 17th Streets. While the monument grounds no longer support official military use, U.S. Marines were observed exercising on the grounds during March 2003 field investigations.

Another missing land use is agriculture, which occurred primarily during the 19th century. Grasses on the monument grounds are known to have been cut over for hay to feed livestock. A feed house and stable erected in 1855 may have housed government horses. During the Civil War, a herd of cattle was kept on the site *(figure 2-7)*, and sheep were grazed there during World War I. Ponds created on the grounds were used between the 1870s and 1907 by the U.S. Commission of Fish and Fisheries to raise fish; related facilities included hatching pools along

the embankment between the ponds *(comparative photographs: figures 4-12a and 4-12b)*. None of these agricultural uses survive on the site today.

Summary: Land Use Features

Contributing Features	Non-Contributing Features
Commemorative Recreational Public Gathering Visitor Services	

TOPOGRAPHY

The existing landform and topography of the Washington Monument Grounds was formed and gained its current character and configuration by the end of the period of significance. The existing topography of the Washington Monument Grounds is the result of massive and numerous manipulations of the natural ground plane. Visitors to the site today might find it hard to believe that much of the site was underwater when Washington City was established. Thousands of cubic yards of fill have transformed the site and resulted in a man-made ground plane. The most significant feature resulting from this manipulation, the knoll that serves as a base for the monument, was designed to stabilize it and provide an attractive approach. Created during the completion of the monument, this gentle rise in grade has undergone a number of minor alterations since 1889 as circulation patterns have been changed.

When construction began on the monument, the western part of the site was low and marshy, with water coming so close to the Jefferson Pier that watercraft were tied to it upon landing *(figure 2-6)*. The site was described as late as 1872 as being partly "overflowed at high tide" *(figure 2-8)*. In the 1870s, a lake and two ponds were constructed by cutting and filling this marshy area to control flood waters; by 1938, these were filled and a flood control dyke built along Constitution Avenue. In fact, most of the earthmoving activity on the site has been related to flood control and water management, although some actions, such as the mound or knoll, relate to engineering and aesthetic purposes. While high ground was intentionally chosen as a location for the monument, the original landform was much less prominent than today's knoll, which has been augmented by fill. The dramatic effect of the mound is enhanced by the expanse of level ground around the monument's base, which has also been filled and graded over the years.

The Mound

The most notable topographic feature on the monument grounds is the mound or knoll upon which the monument stands. When construction on the Washington Monument was suspended in 1854, the monument stood on a small, steeply-sided knoll (*figure 4-3*). By the time of its dedication in 1885, the mound's upper terrace had been expanded. At that time, however, Thomas Casey, the engineer who guided the monument's design, proposed that the knoll be expanded even further and the sides be made to slope gradually. An 1889 plan shows the proposed new grade, which was achieved by depositing thousands of additional cubic yards of fill on the mound and other parts of the grounds *(figure 2-28)*. This massive regrading effort established the general profile of the mound present today. It serves to mask the monument's massive tiered foundation, and enhance its dramatic siting.

The Flats

In addition to the mound, the site's pre-1791 topography has been manipulated in a number of ways since the preparation of the L'Enfant Plan. In the 1870s, the grounds were graded, including cutting of the high ground along 14th Street to fill along 14th Street north of the road entering the grounds. The lake and ponds added to the northwestern part of the site in the 1870s also were formed through site grading. Grading occurred in the northern portion of the grounds in the 1890s. The two ponds in the northwest corner of the grounds were filled in 1910. In the 1930s, the Works Progress Administration workers leveled the grounds west of the monument where a seventeen-foot-tall flood control dyke was been constructed. Today, these manipulations of the ground are not obvious: the gently sloping, level, grassy grade of the site is relatively uniform, stretching from the knoll out to the tree-lined boundary streets *(comparative photographs: figures 4-12a and 4-12b)*.

Berm

A ten-foot rise in topography occurs southeast of the Monument Lodge. This was modified in 1951 to improve the intersection of Independence Avenue and 15th Street, and again in 1997 as part of the 15th Street, Jefferson and Madison Drive realignment project. This high point has also been accentuated at some point to provide the illusion of a single green swath extending between the Mall and the Washington Monument. Although it has been changed, this berm is contributing feature *(comparative photographs: figures 4-13a and 4-13b)*.

Adjacent Topography: Potomac Flats

The filling of the Potomac Flats between 1882 and 1897 altered the surrounding context of the monument. The Potomac River, which once abutted the site, is no longer visible from the grounds. The Tidal Basin was also created at that time, however, providing an additional constructed water feature of interest for visitors.

Summary: Topography Features

Contributing Features	Non-Contributing Features
The Mound (T-1) The Flats (T-2) Berm between 14th and 15th Streets (T-3)	

CIRCULATION

Of the landscape features associated with the Washington Monument Grounds over the years, circulation has changed the most dramatically. Contributing resources include most of the perimeter roads around the Washington Monument Grounds, the plaza at the base of the monument, and a few walks and one set of steps. Various circulation features associated with earlier periods of the site's history are no longer extant. Few of the existing walks were established during the period of significance. Numerous roads and associated features established after 1943 including 15th Street, the 16th Street parking lot, and Madison and Jefferson Drives also constitute non-contributing resources.

Two graphic sources indicate circulation features associated with the monument grounds in the late 19th century. These include an 1880s bird's eye view *(figure 2-15)* and an 1885 U.S. Geological Survey map of Washington *(figure 2-21)*. These sources show one roadway passing through the monument grounds. This roadway enters the site from B Street (later Constitution Avenue) at Meridian Avenue (later 16th Street) and curves around the southwestern side of the monument, terminating at 14th Street opposite the Agriculture Department grounds.

Numerous plans relating to the monument's second phase of construction show an elaborate network of curvilinear carriageways encircling the knoll *(figures 2-20, 2-26, and 2-28)*. Few sources exist to confirm which of these were ultimately built. The interior curvilinear roadways present when the site opened to the public are thought to have been inspired by A.J. Downing's mid-19th-century design for the Mall. Some of these continued to exist after the adoption of the more formal McMillan Plan in the beginning of the 20th century, but most were removed in the 1930s and 1940s.

By the 1890s, the 14th Street entrance near the Agriculture Department was abandoned and new entrances to the grounds were in place at 15th Street and 14th Street along the grounds' northeastern edge. Several of the planned carriage roads were in place by this time as well. Curving drives surrounding the knoll highlighted the monument's object-like quality *(figure 2-31)*. Circulation within the grounds remained little altered until the 1930s. In 1936, the NPS implemented a plan to remove several of the existing roads, including 16th Street. These former circulation corridors were re-graded and planted with grass *(figures 2-52 and 2-53)*. In 1956, Mission 66 plans for site improvements included the removal of the approach roads leading to the monument's base. By 1961, vehicles were no longer permitted within the plaza areas. Today, vehicular traffic remains excluded from most of the grounds, with the exception of 15th Street, Madison and Jefferson Drives, and the 16th Street parking lot.

There has been less change associated with the roads and sidewalks along the perimeter of the site. Although road widening and regrading have occurred, Constitution Avenue and 14th Street have anchored the northern and eastern boundaries of the grounds since they were first delineated. Likewise, a paved plaza has existed at the base of the monument since 1889. Seventeenth Street and Independence Avenue, developed in the early 20th century on land reclaimed from the Potomac Flats, are also contributing circulation features.

Constitution Avenue and 14th Street

Constitution Avenue and 14th Street, which bound the Washington Monument Grounds on the north and east respectively, have edged the site since the 19th century. In 1931, Constitution Avenue was widened and its original flagstone sidewalks displaced. These roads connect the site to the urban grid, and their bordering sidewalks provide pedestrian access to the site. The rows of trees lining their edges also connect these street corridors to the larger pattern of city street-tree plantings. While the individual street trees likely do not survive from the period of significance, the patterns of these circulation features along the northern and eastern edges of the site are contributing resources.

16th Street

Vehicular circulation within the monument grounds initially consisted of a main roadway entering the site at the intersection of 16th Street and Constitution Avenue. Known as "Meridian Avenue," this road was thirty-five-feet wide and surfaced with gravel. It led south into the site between the ponds present at the time, curving around the southwestern side of the knoll and connecting to 14th Street near the southeastern corner of the grounds. By the 1890s, trees had been planted along the 16th Street entry into the monument grounds. Sixteenth Street also appears as a tree-lined road through the grounds on the 1902 McMillan Plan *(figure 2-31).* The trees appear closely spaced and likely formed an allée-like approach to the monument.

Sixteenth Street was removed in 1936 as part of a larger plan to alter circulation within the grounds. The existing parking lot was added in 1943, when temporary military office buildings occupied the central part of the grounds *(figure 4-5*). The entry to the lot and its central island, still extant today, follows the alignment of the old street and parking lot established by the Army.

17th Street

Seventeenth Street existed as part of the city's grid of streets northwest of the monument grounds by 1851 *(figure 2-3).* It appears to have been gradually extended southward as land was reclaimed over the Potomac Flats. The road corridor assumed its current configuration by 1917 *(figure 2-38).*

Independence Avenue

Independence Avenue, a boulevard with a broad, central tree-lined median, was completed in 1943 *(figure 2-56)*. The southern edge of the monument grounds lacked a through road along its edge until the dredging of the Potomac Flats; by the early 20th century, a curvilinear road called the "river" drive existed along the edge of the Tidal Basin *(figure 2-38)*. The current Independence Avenue alignment follows the general route of this earlier drive and a proposed road—B Street South—that was never built.

15th Street and Madison and Jefferson Drives

The north end of 15th Street, flanked by stone gateposts relocated from the Capitol grounds in 1874, appears to have provided an entry to the Washington Monument Grounds by 1889. While B Street (Constitution Avenue), 14th Street, and 17th Street are shown lined with trees on the 1902 McMillan Plan, 15th Street apparently never received the same treatment *(figure 2-31)*, indicating that it may have been considered a secondary roadway. The alignment and function of 15th Street has shifted perhaps more than any other associated with the site. In 1936, in conjunction with the Mall plan to follow the McMillan Plan, connections to Madison and Jefferson Drives were established from 15th Street. In 1963, the 15th Street roadway was replaced with a pedestrian walkway. The roadway was slated for realignment as part of the 1981 Development Concept Plan (DCP). This concept was implemented based on the revised DCP in 1993 *(figure 2-82)*. Today, 15th Street, a curvilinear vehicular roadway with adjacent sidewalks, constitutes the site's primary vehicular access route. While entrances were constructed along 14th Street across from the ends of Jefferson and Madison Drives, these two roads were realigned in their current diagonal alignments in 1997.

Survey Lodge Service Drive

The service drive around the Survey Lodge was initially oriented to the northeast and connected, via two Y intersections, to a former curvilinear drive within the monument grounds. Several plans, including a 1902 site plan and a 1917 existing conditions plan, show this tree-lined oval drive *(figures 2-31* and *2-38)*. When the curvilinear drive was removed in 1936, the service drive was modified to follow part of the alignment of an old carriage road. It later connected to the new Independence Avenue *(figure 2-52)*. By 1950, the drive connected only to Independence. By 1981, it had taken on its current configuration *(figure 2-83)*. A small portion of the existing service drive is flanked by cobble-lined gutters, which may survive from the original oval drive.

Plaza

There has been a level paved area at the base of the Washington Monument since the completion of its construction, although the plaza has evolved over the years. In 1887, the plaza was a ten-foot-wide apron of granolithic stone laid to prevent erosion. In 1889, it was extended to cover a circular area with a seventy-foot radius, set within an eight-inch granolithic curb and gutter *(figure 2-28)*. A fifty-foot-wide gravel roadway was to encircle the plaza and connect with thirty-foot-wide roadways and nine-foot-wide walks leading to various entrances at the perimeter of the

grounds. Formal paving was added after 1906 to address complaints of wind-blown dust from the graveled surface. As of the most recent renovation in 2000, the apron consists of an inner circle of concrete measuring 74 feet in diameter and an outer ring of asphalt measuring 120 feet in diameter. The current size of the plaza is derived from the original plaza with the addition of the former roadway that encircled it.

Pedestrian Walks and Paths

Most of the pedestrian circulation existing on the site today has been added in recent years. While some existing circulation follows the general alignment of historic paths, the grading and materials of the walks have changed and been replaced numerous times over the years. The many changes to pedestrian circulation in the western portion of the grounds reflects the various uses of the area. The construction and filling of lakes and ponds, the addition and removal of recreational facilities, and the erection and removal of temporary buildings during World War II have affected walks and paths to various degrees *(figure 4-5).*

The first known mention of pedestrian circulation at the Washington Monument Grounds dates from 1888 when Thomas Casey began to upgrade the grounds. The first location-specific mention of paths dates from 1889. That year, a boardwalk is described as extending between 14th Street and the "Lodge House" (likely the Monument Lodge) and the east face of the monument. Other plank walks were added throughout the 1890s, although their locations are not known. Documentation suggests that flagstone walks were laid in 1901-02, and many of the boardwalks were improved through grading, cindering, and/or paving.

Although today's asphalt walks appear to be a contemporary feature of the site, asphalt was apparently used as a paving material as early as 1890-91 when an asphalt walk was constructed from the north side of the monument to the northwest, possibly extending to 17th Street. An asphalt walk follows roughly the same alignment today. In 1891-92 an asphalt walk was built from the northwestern corner of the Monument to 16th Street. An asphalt walk generally follows this route today.

In 1896-97, documentary sources suggest a thirty-foot-wide gravel roadway was added in the northeast part of the grounds. A diagonal walk still runs from the monument to the northeast corner of the grounds at the corner of Constitution Avenue and 14th Street. Another walk in the northeast corner of the site runs diagonally from the point where 15th Street enters the grounds to 14th Street. This walk may approximate the route of a walk established based on the 1936 plan.

A circa 1902 plan shows walks leading east from 16th Street curving around and up to the monument (*figure 2-31*). These walks appear to have survived more or less intact until the 1936 removal of 16th Street and other site features.

In 1942, two parallel walks appear on a site plan leading from the monument towards 17th Street. They stop at the edge of a collection of temporary buildings sited in this area to accommodate the needs of the U.S. Army and others during World War II; it is not known when these walks were built or removed. In 1984, two paths generally following the alignment of the 1942 paths were installed.

Little is known about the origin of walks at the Sylvan Theatre, or the lodges. By 1902, flagstone walks existed around the Survey Lodge, but these were later replaced. Flagstone steps at the Sylvan Theatre may date to its 1917 construction or to landscape changes made in the 1930s.

Development within the site in anticipation of the nation's bicentennial in the 1970s resulted in the addition of some pedestrian circulation features that remain today. These include the small queuing area near the Monument Lodge. Other late-20th-century non-contributing features include the walks within the German-American Friendship Garden.

Today, pedestrian walkways of asphalt and concrete crisscross the site in a relatively informal manner, connecting important intersections and features. While some of the current walks suggest remnant alignments of former circulation features, none appear to be completely intact or retain material integrity.

Connections to Adjacent Sites

Formal crosswalks provide connections to the Ellipse to the north, the Reflecting Pool to the west, the Tidal Basin to the south, and the National Mall and Smithsonian to the east. Most of these post-date the period of significance and are non-contributing features. Connections between these areas of the Mall and the Washington Monument Grounds make the site amenable to public gatherings and other activities that require large areas of open space. Access between the monument grounds east to the Mall and west to the Reflecting Pool and Lincoln Memorial is unencumbered by major obstructions. The NPS has placed post and chain barriers along portions of 14th, 15th, and 17th Streets to encourage people to use the crosswalks.

Other Missing Circulation Systems

During the initial construction of the Washington Monument, a rail line was laid across the site, extending from the Baltimore and Potomac line on Maryland Avenue to the base of the monument. Stone and other materials were brought to the site by rail. The rail line was renewed ca. 1880 to support the second phase of construction. A section was elevated on a trestle to reach the top of the knoll as the monument neared completion. The track and trestle were removed after construction was completed in 1885. No trace of the rail line remains today.

Summary: Circulation Features

Contributing Features	**Non-Contributing Features**
17th Street corridor, including sidewalks (C-1)	15th Street corridor, including sidewalks, bus pull-offs (C-7)
Constitution Avenue corridor, including sidewalks (C-2)	Madison Drive corridor, including sidewalks, bus pull-offs (C-8)
14th Street corridor, including sidewalks (C-3)	Jefferson Drive corridor, including sidewalks, bus pull-offs (C-9)
Independence Avenue corridor, including sidewalks (C-4)	16th Street parking lot and drive (C-10)
Flagstone steps at the Sylvan Theatre (C-5)	Wooden ramp at Sylvan Theatre (C-13)
Walks between the monument and 17th Street (C-6)	Queuing area, Bicentennial development (C-

Monument plaza (C-11)	14) Walks within German-American Friendship Garden (C-15) Walks at Sylvan Theatre (C-12) Oval service drive at Survey Lodge (C-16) Walks at Monument Lodge (C-17) Terrace at Monument Lodge (C-18) Walks at Survey Lodge (C-19) Concrete sidewalks (C-20) Asphalt walks/paths (C-21)

VEGETATION

Vegetation characterizing the Washington Monument Grounds includes groves of canopy trees and flowering trees, street trees, foundation plantings, a perennial garden, and grass turf. The two primary vegetation types are tree plantings and turf grass. Trees are planted in rows and groves. Rows of trees include the street trees that line the perimeter roads and short segments that may survive from earlier patterns of spatial organization or circulation features that are no longer extant. Groves include groupings of deciduous canopy trees and flowering cherries. The use of street trees to line the District's primary streets and avenues dates to the early monument construction period. Groves of canopy trees appear to have been planted since the mid-20th century, possibly since the period of significance. A small grouping of mulberry trees southwest of the monument may constitute the only naturally-occurring vegetation on the site. These were present by the period of significance and constitute contributing resources. Although the use of ornamental vegetation within the grounds dates to as early as 1886, few examples of ornamental plantings likely survive from the period of significance. The existing cherry groves appear to have been planted on the Washington Monument Grounds since 1955 and are non-contributing features of the landscape.

Street Trees

Street trees were present as early as 1855 on the 14th Street side of the monument grounds. By the 1870s, rows of deciduous trees were planted along portions of B Street (Constitution Avenue), along 14th Street, and along both sides of Meridian Avenue (16th Street) at twenty-five-foot intervals *(figure 2-9)*.[4] Beginning in the early 1870s, efforts were made to improve the "Monumental Grounds," as they were called. Artistic renderings of the site indicate that trees were planted along the curving road that ran through the grounds *(figures 2-15 and 2-16)*. The renderings suggest the trees lining the west and south sides of the road were widely spaced. A photo dating to ca. 1884, shows trees along the curvilinear road, 16th Street, B Street, 14th Street, and the southern edge of the site (*Figure 4-6*). The information conveyed in the 1884 image is corroborated by historic site plans and annual reports.

In 1880, mixed varieties of trees are known to have lined 14th Street *(figure 2-12)*. Trees continue to line 14th Street today, although a gap has been left in the planting to enhance the vista towards the U.S. Capitol.

Constitution Avenue is currently edged by closely-spaced double rows of elm trees. In 1880, the road corridor was edged by a single line of poplars to its south *(figure 2-12).* Independence Avenue also includes a line of trees along its length, except for a gap associated with the 16th Street axis providing views toward the White House. Seventeenth Street, not established until the Potomac Flats were filled in the 1890s, is also lined with trees. The use of street trees along these perimeter roads contributes to the historic significance of the site.

Turf Grass and Groves of Trees

One of the improvements made to the grounds in 1873 included the planting of grass lawn. Grass was again added after the grounds were regraded in 1875-76. As part of this effort, they were covered with street sweepings and seeded with bluegrass and rye. Grass has continued to characterize much of the monument grounds landscape ever since. The central portion of the Washington Monument Grounds particularly is characterized by open grassy lawn.

Records indicate that a variety of trees, including evergreens, maples, elms, and others "suited to the grounds" were planted after the 1875-76 grading efforts were completed, and in 1888 as part of the grounds improvements. Additional trees were added in 1905-06. Today, open groves of trees standing in the southeastern and southwestern corners of the grounds likely contain trees surviving from early-20th-century plantings.

Other plantings of the late 19th century included flower beds laid out in the triangles formed by the intersections of roads and walkways *(figures 2-20, 2-31).* These do not survive today. With the exception of the German-American Friendship Garden (discussed below), there are no flower gardens present on the grounds today.

Plantings around Buildings

Early photographs of Monument Lodge show little vegetation around its perimeter until after 1931 *(figures 2-29 and 2-40; and comparative photographs: figures 4-10a and 4-10b, 4-21a and 4-21b, and 4-22a and 4-22b).* It is not yet clear whether any of the existing plantings survive from 1931, although it is likely that the area has been replanted numerous times as part of the various landscape renovations that occurred around the lodge in 1948, 1955, and 1963. A 1989 landscape rehabilitation plan indicates that the plantings were planned to be renewed at that time.

The Survey Lodge sits in a grove of trees and shrubs. There were apparently no trees or shrubs around the lodge building when it was completed in 1889. By 1902, a grass oval lined with trees had been constructed around the building *(figure 2-31).* It is unclear whether any of the extant trees near the Survey Lodge remain from this planting. Plantings are known to have been added around the building in the 20th century, but little is known about them.

Ornamental plantings have been part of the design of the Sylvan Theatre since its early days; hence the name "sylvan." However, the early plantings associated with the theater appear to have been replaced by new designs over the years. A 1931 map shows privet hedges encircling the theater on the sides and rear, forming open-air dressing rooms to either side of the stage *(figure 2-70).* Remnants of this privet hedge now lead to dressing rooms housed in metal buildings to the

west and east of the stage. A row of hollies planted along the back of the theater appears to have replaced a group of shrubs that existed in 1931. The hollies and other shrubs in this area convey the same feeling of enclosure as the earlier vegetation, and also effectively screen the rear of the theater from the street, but do not likely survive from the period of significance.

Cherry Trees

The existing groves of cherry trees post-date the period of significance. Among the many ornamental trees and shrubs recorded on the site in 1886 are two flowering cherry trees (*Prunus spp*). However, it appears that cherry trees were not planted in any significant number until well after the Tidal Basin cherry tree plantings were begun in 1912.

Cherry groves may have first appeared on the monument grounds in 1954-55 in association with the Sylvan Theatre plantings. A variety of species, including Yoshino, Kwanzan, and Rosea cherries, are indicated on a 1954 planting plan *(figure 2-74)*. Today, 341 of the 342 cherry trees on the monument grounds have been identified as Yoshino, and the other is a Kwanzan.[5] Several dense groves of cherries exist today in the vicinity of the Sylvan Theatre. One is centered 140 feet west of the stage and another is located 130 feet to its northeast. There are also groves of cherry trees west and southwest of the 16th Street parking area and between the parking lot and 15th Street. The presence of cherry trees on the monument grounds ties the site to the ring of cherry trees around the Tidal Basin to the south.

The German-American Friendship Garden

Begun in the 1980s and as yet unfinished, the German-American Friendship Garden includes shrubs, grasses, perennials, brick walks, and circular fountains.[6] These garden plantings, which flank the entrance to the 16th Street parking lot, are non-contributing.

Summary: Vegetation Features

Contributing Features	**Non-Contributing Features**
Lawn (Ve-1)	Street trees along Independence Avenue (Ve-6)
Grove of mulberry trees (Ve-2)	German-American Friendship Garden plantings (Ve-12)
Street trees along 17th Street (Ve-3)	Lines of trees (Ve-13)
Street trees along Constitution Avenue (Ve-4)	Cherry groves (Ve-11)
Street trees along 14th Street (Ve-5)	Monument Lodge plantings (Ve-7)
Open groves (Ve-10)	Survey Lodge plantings (Ve-8)
Individual trees (Ve-14)	Sylvan Theatre plantings (Ve-9)

BUILDINGS AND STRUCTURES

The prominence of the obelisk within the Washington Monument Grounds and the National Mall has been maintained throughout its history, particularly since its completion in 1884, while the significance of the Washington Monument as a national symbol appears to have grown over time.

Most of the other structures that occupied the site during the late 18th and early 19th centuries, including construction-related buildings, military structures, housing, and stables are no longer extant. Before the Washington National Monument Society took control of the site, there were apparently some houses and fences built on the grounds. These were removed by the time construction began in the 1840s. Recreational facilities from the early 20th century, including tennis courts, a boat house, a swimming pool, and associated facilities have also vanished. Temporary buildings erected on the site during World War II were the last to be removed. Some remained on site until the mid-1960s.

Two buildings constructed on the Washington Monument Grounds during the 19th century—the Monument and Survey Lodges—survive, although their uses have been modified. The Survey Lodge was constructed circa 1885 as a boiler house for the monument. It now serves as an NPS administration facility and as a limited visitor contact facility with restrooms. The Monument Lodge, originally intended to accommodate the public comfort, continues to serve the needs of visitors. Aside from a 1960s concession addition on the Monument Lodge, the exteriors of the two lodge buildings remain generally unaltered since 1889. However, their surroundings, including plantings and circulation, have changed greatly since the 19th century.

The Sylvan Theatre, established in 1917, has become a more permanent structure over time, with various additions and accompanying structures augmenting the feature.

The Washington Monument

Despite being constructed a few hundred feet from its originally intended location, the pyramidion-topped obelisk has maintained a commanding position and relationship to the Capitol to the east and the White House to the north since its completion. Between 1854 and 1880, the monument stood in a state of partial completion. Once completed, the obelisk stood 555 feet in height, supported by a 55-foot-square base and surrounded by a level plaza set atop a steeply-sided artificial knoll.[7] Much of the knoll was constructed from fill placed to stabilize the massive, tiered, concrete footings that support the weight of the monument. The grassy knoll and the obelisk remain the dominant features within the landscape today. Although the knoll has been reshaped and augmented several times since 1885, its relationship to the monument has remained constant. (*See the Topography section earlier in this chapter for further information*.)

Survey Lodge

The Survey Lodge, originally designed as a boiler house to supply steam power to the Washington Monument elevator, was built in 1885. The lodge's most prominent feature is its forty-foot-tall chimney. A steam tunnel that once led from the Survey Lodge to the monument is

now covered by a sidewalk. The building, expanded in 1901, now houses NPS personnel offices and public rest rooms. In general, the building retains its original structural features and character.

Monument Lodge

Monument Lodge, begun in 1888, was constructed as the arrival point for visitors to the monument. It was always intended as a waiting room for tours of the Washington Monument, with public rest rooms. Although the west side of the building has been altered through the addition of a 1960s-era concession stand, its eastern façade remains relatively unchanged *(comparative photographs: figures 4-21a and 4-21b, 4-22a and 4-22b)*. Minor modifications include a wooden platform and ramp for universal access that covers the concrete terrace. The Monument Lodge continues to house restrooms, and souvenirs and books are sold in a small store in the front portion of the building.

Sylvan Theatre

The Sylvan Theatre began as an earthen stage in 1917 *(figure 2-37)*. It was proposed as a "theatre for Shakespeare" in 1916 by Alice Pike Barney, a patroness of the arts. A 1931 plan of the theatre and its landscaped surroundings shows a stand of trees behind the stage and steps leading down from either side of the front of the stage *(figure 2-70).* Dressing rooms were created on either side by privet hedges; the audience most likely sat on the grass. The first permanent stage, four feet tall and rectangular in plan, was built in 1944. The proscenium arch was added in 1962. A plan for the comfort station next to the theater was developed in 1974. In 1976, a temporary visitor center, the Kodak Theatre, was built between the Sylvan Theatre and the Monument Lodge *(figure 2-82)*. The Sylvan Theatre was also renovated at this time. Dressing rooms and sheds, as well as other additions at the Sylvan Theatre, presumably reflect these renovations.

Jefferson Pier

The location of the intersection of two axes or meridia—one extending south from the White House, and the other west from the Capitol—was first demarcated in 1793 with a wooden post. The stone Jefferson Pier replaced the wooden posts in 1804. The present marker is a replacement for the original, which was unintentionally destroyed in 1872. Because the pier today sits in a treeless part of the site, it is a conspicuous component of the landscape and a surviving structure from the early history of the monument grounds *(comparative photographs: figures 4-9a and 4-9b)*.

Bulfinch Gateposts

Several pairs of gateposts that once occupied the grounds of the U.S. Capitol were moved to a series of intersections along Constitution Avenue (then B Street) in 1874. A pair of the gateposts still flanks 15th Street at its intersection with Constitution Avenue.

Missing Buildings

A number of construction-related buildings were erected on the Washington Monument Grounds to support the ambitious monument construction project. Because the monument was built in two stages, two sets of construction buildings have existed on the site. The first set included stone-working shops, storage, and security facilities. Also during this period, a wharf and railroad grade supported the work. These stood until the end of the Civil War. The second group stood between circa 1880 and 1885. They included stone cutters' sheds, a carpentry shop, storage for lumber, cement, iron, and tools, an engine house, water closet, lapidarium, offices, three forges, and tool sharpening and blacksmith shops. A sketch plan exists to illustrate the layout of the monument grounds when these buildings were standing *(figure 4-2).*

Recreational Facilities

Numerous recreational structures have come and gone within the monument grounds since the early 20th century. By the 1920s there were at least fifteen tennis courts on the grounds. The earliest courts, shown on a 1917 plan, were built in a block of five to the northeast of swimming facilities along 16th Street *(figure 4-7).* A 1919 plan reveals a block of ten more courts west of the swimming pools. The block of ten was gone by 1930 and the other five were removed by 1936 when Works Progress Administration (WPA) workers leveled the northwestern part of the grounds in preparation for constructing a seventeen-foot-tall flood control dike or levee.

The 19th-century fish ponds, located in the northern part of the grounds, were converted to swimming basins in 1907. A 1905 topographic map showing lines for a proposed sewer system indicates the ponds, supply house, and watch house for the fisheries *(figure 2-34).* A domed building labeled "Supply House" on maps showing the fish ponds appears to have been converted into a bath house when the ponds were transferred to the District Commissioners "for use as a Bathing Beach in June 1907." [8] By 1910, when the ponds, after their brief tenure as "bathing basins," were filled, additional swimming pools had been constructed in the location of the former hatching ponds on the levy between the north and south ponds. A 1917 plan shows rectangular pools and associated structures, including a structure housing shower baths and dressing rooms *(figures 2-38 and 4-7).* A boat house in this cluster was later removed and its foundation converted into an outdoor swimming pool. The pool was later drained and filled, and then rebuilt as a boat house before being removed altogether in 1936. Other support buildings at the swimming area included an office and toilets. All of these facilities were removed in 1936 when the area was regarded by the WPA. Nothing remains of these features today.

Temporary War Buildings

In 1942, a complex of temporary office buildings was constructed in the western half of the grounds between 17th Street and the former 16th Street alignment. A plan shows three distinct structures, two parallel to 17th Street and the third parallel to Constitution Avenue *(figure 4-5)*. Some of the war-related buildings remained on site until 1970-71.

Non-Contributing Buildings

Numerous small structures were added to the monument during the latter part of the 20th century to support tourism and other purposes. These include kiosks for bus tour and ticket sales; a comfort station near the Sylvan Theatre; a retaining wall along 15th Street; light vaults; and the temporary entry station structure at the monument base.

Summary: Building and Structures Features

Contributing Features	**Non-Contributing Features**
Washington Monument (B-1)	Monument Lodge addition (B-3)
Monument Lodge (B-2)	Sylvan Theatre dressing rooms (B-5)
Survey Lodge (B-4)	Sylvan Theatre sheds (B-6)
Jefferson Pier survey marker (S-1)	Comfort station (B-7)
Sylvan Theatre stage (S-2)	Ticket kiosk (S-4)
Bulfinch gateposts (S-3)	Bus tour kiosk (S-5)
	Light vaults (S-6)
	Monument entry station (S-7)
	Granite retaining wall (S-8)

SMALL-SCALE FEATURES

Small-scale features are one of the most difficult resource types to compare over time at the site, because they are little discussed in early documents and are not easy to discern in historic maps and photographs due to their size and scale. Consideration of existing small-scale features through observation suggests that most of the extant small-scale features on the Washington Monument Grounds appear to be of relatively recent origin. A few features, such as the cobblestone gutters near the Survey Lodge and a few bench and light post types, may survive from the period of significance. Other features of more recent origin that, while not historic, are consistent with the site's historic character and design intent. For instance, the flagpoles that ring the monument plaza do not date to the period of significance and were apparently not part of either Mills' or Casey's visions for the site, but temporary flagpoles were used around the plaza during the period of significance. These features remain consistent with and enhance the ceremonial intent of the monument, and they symbolize the expansion of the meaning of the site to broader patriotic themes.

Constructed Water Features

Although there are no extant water features on the Washington Monument Grounds save two small fountains in the German-American Friendship Garden, water features were formerly important components of the landscape. When the grounds were first delineated, the Washington Canal edged the site to the north. By 1873, Babcock Lake had been created to the north of the monument; three years later there were two additional fish ponds on the site, created as flood control measures. The ponds were replaced by swimming pools, which lasted from 1907 until the mid-1930s. Other water features important to the site's context include the Tidal Basin to the south and Reflecting Pool to the west.

Washington Canal

The Washington Canal was created in 1815 through the channelization of Tiber Creek. It followed the current alignment of Constitution Avenue along the northern edge of the grounds. Never a successful enterprise, the canal was culverted between 1871 and 1873 prior to being covered by a roadway, then called B Street, that later became Constitution Avenue. Constitution Avenue still forms the northern boundary for the Washington Monument Grounds, following the historic alignment of the canal.

Babcock Lake

Babcock Lake was created north and west of the monument in 1873. It was fed by natural springs, the Potomac River, and a 4-inch supply pipe that ran 800 feet between 14th Street and the lake. A second pipe fed an aeration fountain in the middle of the lake. An undated, ca.-1870s somewhat fanciful depiction of the site shows the lake and its fountain as an element in the park landscape that was to be retained as an ornamental feature after the monument's completion *(figure 4-8)*. The lake did not, however, last long; it was filled in 1887 because engineers feared it was destabilizing the monument's foundations. During its brief existence, Babcock Lake was utilized by the U.S. Commission of Fish and Fisheries to raise fish.

Fish Ponds and Swimming Pools

During the second construction period in the 1870s-1880s, the Army Corps of Engineers created two ponds on the northwestern edge of the grounds, one six acres in size and the other four acres, to act as a flood prevention measure *(figures 2-26 and 2-34)*. The banks of the ponds were sodded and paved with cobblestones; one had an island in its center accessed by a small bridge. The ponds flanked the proposed alignment of Virginia Avenue, which was never extended into the monument grounds, although a right-of-way appears to have been left between the ponds for that purpose.

In 1877, a third pond was added to the south of the others, and west of the monument, where an inlet of the Potomac River was enclosed and cut off from the river itself, likely as part of flood control measures prior to the filling of the Potomac Flats. All of these ponds were turned over to the U.S. Commission of Fish and Fisheries in 1878 and used to raise carp. A series of hatching

ponds was constructed on the land between the east and west ponds by the commission, which also built a small "acclimatization pond" extension by digging out in the eastern bank of the south pond for the introduction of newly hatched fish. The ponds went out of use as a fishery circa 1905; in 1907 they were converted to use for public bathing. Between 1908 and 1911, the ponds were filled with ashes and clay and the ground graded and seeded. The hatching ponds between the old lakes were converted to swimming pools ca. 1910, remaining in use until 1936 when they were removed to prepare for construction of a flood control dyke to "protect federal buildings on Constitution Avenue."[9] No visible trace of these water features remain on the surface today, although the northwestern corner of the Washington Monument Grounds consistently exhibits ponding on the poorly-drained soil.

Adjacent Construction Water Features

Constructed water features are also located on lands adjacent to the Washington Monument Grounds, including the Tidal Basin and Reflecting Pool. The Potomac Flats to the west of the Monument Grounds were still tidal marshes when the monument opened to the public in 1889. At the time the monument was begun in 1848, and even after it was completed, these marshlands reached nearly to its base *(figure 2-9).* An engineering project to fill the flats began in 1897 and was not completed until 1901. It resulted in the creation of East and West Potomac Parks and the Tidal Basin.[10] Prior to construction of Independence Avenue, the Tidal Basin abutted the Washington Monument Grounds.

The Reflecting Pool, built in conjunction with the Lincoln Memorial, is linked to the monument grounds both visually and symbolically. The 1902 McMillan Plan conceptualized a cross axial relationship between the Washington Monument and important buildings or memorials on all four sides. Designers of the Reflecting Pool took into account the view of the monument and conversely the view of the Lincoln Memorial and their reflection in the pool.

Elevation Obelisk

The elevation obelisk, placed on the site in 1898 by the Coast and Geodetic Survey, was intended to serve as a benchmark for the Washington Monument. It was placed in a manhole 150 feet south of the monument for the purpose of calculating the settlement of the monument. It is not visible from the surface of the site.

Site Furnishings

Benches

Benches have been placed around the monument grounds for visitor comfort since at least 1905, when park "settees" are mentioned in annual reports about maintenance on the grounds. Their placement within the grounds and appearance are not described in these sources, however. In 1932, the monument base was encircled with eighty-four benches around the inner curb. These cast-iron-and-wood-slat benches appear in photographs from 1942 *(figures 2-61 to 2-63).* In 1958, additional benches installed in a ring beyond the circle at the base of the monument provided seating for visitors not planning to ascend the structure. In 1963, the 1932 plaza seating

was replaced by concrete-and-wood-slat benches. All of these former benches were replaced by the existing outer ring of benches in 2002. These backless benches are composed of recycled plastic. A few of the old-style benches, composed of a black cast-iron frame with an unpainted wood-slat seat and back, remain elsewhere on the monument grounds, as well as along Constitution Avenue *(figure 3-55).*

Concrete-and-wood-slat backless benches at the Monument Lodge appear to date to 1963 and the development of the addition and terrace.

The granite benches in the German-American Friendship Garden were added to the site in the 1980s and are non-contributing resources.

Flagpoles

A ring of forty-eight American flags was temporarily flown at the base of the Washington Monument for the first time to commemorate George Washington's birthday in 1920. By 1940, flags were regularly placed in a circle around the base of the monument as part of the 4th of July celebrations. In 1942 a joint Resolution allowed the flags to stay up at night for the desired patriotic effect. Mission 66 improvements implemented in 1957 included installation of permanent, twenty-five-foot-high, aluminum flagpoles, and associated floodlights placed in four underground vaults. In 1971, President Nixon issued a Presidential Proclamation to allow the flags to fly twenty-four hours a day. Fifty American flags, each representing a state, continue to encircle the monument twenty-four hours a day *(comparative photographs: figures 4-15a and 4-15b).*

Lighting

A few light poles within the monument grounds are known to have been used historically and during the period of significance. It is difficult in some cases to determine whether the existing light poles were actually placed on the site during the period of significance, however. The historic light pole types include the Washington Globe single lamp street lights, the Olmsted single lamp street light, and the "Twin Twenty" double lamp street lights. The Twin Twenty standard was used for major roads and avenues in the Mall area between 1923 and 1960.[11] According to NPS, the single Washington Globe lights were in place along Constitution Avenue at 14th Street by 1936; and Olmsted lights were in place on Jefferson Drive by 1937 and the 16th Street parking lot entrance road by 1947 (*comparative photographs: figures 4-19a and 4-19b*). Missing today is another type of globe light visible in photos from the 1920s around the monument base and along 15th Street (*comparative photographs: figures 4-16a and 4-9a*).

In the 1880s, the only known lighting on the Washington Monument Grounds consisted of gas lamps along 14th Street, according to an 1880 map showing gaslight locations in the city *(figure 2-14).* Twelve electric lights were added along the roadways within the grounds circa 1904-05. These were supplemented by fifty-five new gaslights in 1911-12. Lights were added to the tennis courts in 1927. In 1930-31, lighting was added to the exterior of the Monument Lodge and to the Sylvan Theatre.

Street lighting was planned to be enhanced in 1951, with 1,000-lumen globes to be upgraded to 2,500-lumen Washington Globe lights along 15th Street. The 15th Street lights were replaced again in the late 20th century realignment of the roadway. Other Washington Globe-style lamps exist elsewhere on the site, and may survive from the period of significance.

In 1925, the monument was first lit by searchlights from the nearby Powhatan Hotel. In 1929, more searchlights were added for the safety of airplanes; in 1931, red warning lights were installed on the top of the monument to take over this function. Floodlights were first installed on the grounds to illuminate the monument at night in 1931-32. Twenty of these lights were installed near the base of the monument. Darkened between 1941 and 1945, these original floodlights were replaced in 1958 with a new system installed in four underground vaults placed to each side of the obelisk. They are lit daily from late afternoon until dawn. Other floodlights, installed later, are located a few feet from the monument's base. There are also spotlights mounted on elevated concrete piers. These lighting features postdate the period of significance and are non-contributing resources.

Other Site Furnishings

The first known mention of drinking fountains on the grounds is one installed for visitor use on the north side of the Monument Lodge in 1902-03. This drinking fountain does not survive. All of the existing fountains on the site appear to post-date the period of significance.

Before 1963, the only trash receptacle type mentioned in association with the site is a wire basket. In 1963, wood-slat trash receptacles with metal liners and covered tops were installed on the monument grounds. No contributing trash receptacles remain on the monument grounds today.

Fencing

One fence on the monument grounds appears to survive from the period of significance. This is a decorative cast-iron fence enclosing two planting areas associated with the Monument Lodge. All other fencing features appear to post-date the period of significance and constitute non-contributing resources. There are currently two other fence types found on the site. The most prevalent is metal post-and-chain fencing, which is found near the Survey Lodge and the Sylvan Theatre, along 14th and 15th Streets, at the 16th Street parking lot, and along one of the walks. While this post-and-chain fencing was installed after 1943, this type of fencing was used on the site as early as 1901 near the Survey Lodge (*comparative photographs: figure 4-16a*). The other fence type present today is a wooden board fence surrounding the service area behind the Survey Lodge.

Other fencing types historically used on the grounds but no longer present include earlier versions of post-and-chain fences along roadways and paths, chain-link fencing surrounding the temporary buildings erected on the monument grounds during World War II (*comparative photographs: figure 4-9a*) and wire wickets bordering the sidewalk in front of Monument Lodge (*comparative photographs: figure 4-10a*).

Drainage Features

As early as 1901, cobblestone gutters, 2-1/2- to 3-feet-wide, are noted as being constructed throughout the site. It is possible that the remnant stone-lined drainage ditch along the edge of the Survey Lodge service drive dates to this period. As such it is a contributing resource. No other examples of this gutter type remain currently visible on the monument grounds.

Plaques

Currently located along the center of the pedestrian walk leading to the monument plaza east/northeast of the entry station, the dedication plaque is a large bronze tablet with raised lettering that details the contributions of various groups and individuals to the establishment of the Washington Monument. Struck in 1885 under the direction of the Washington National Monument Society, the plaque was originally intended to be sited inside the monument, but Engineer Thomas Casey rejected this proposed location. In 1898, a second request by the Society was similarly denied by the Chief of the U.S. Army Corps of Engineers. The plaque was subsequently stored in the offices of the Society within the Monument Lodge, until these were lost to an expansion of the restroom facilities in 1931.

The plaque first appears on maps of the site in a December 1956 drawing entitled "Local Plot Plan and Section." It is shown placed to the north of the monument. However, the plaque does not appear again on plans and maps of the monument until the 1990s when it is included in the 1994 HABS documentation drawings of the monument and plaza. It is unclear when the plaque was moved to its current location.

The George Washington granite panel was installed in the late 20th century; other signage also appears to be of recent origin and does not contribute to the significance of the site.

Summary: Small-scale Features

Contributing Features	**Non-Contributing Features**
Elevation obelisk (SS-1)	George Washington granite panel (SS-6)
Twin Twenty double lamp street lights (SS-2)	Monument floodlight (SS-12)
Cast iron and wood slat benches (SS-7)	Monument spotlight (SS-13)
Ring of flagpoles (SS-9)	Stone benches (SS-14)
Dedication plaque at monument base (SS-5)	Cast-iron and recycled plastic benches (SS-15)
Cast iron fencing (SS-10)	Drinking fountains (SS-16)
Stone-lined drainage ditch (SS-32)	Fountains in German-American Friendship Garden (SS-17)
Washington Globe single lamp street lights (SS-3)	100th Anniversary panel (SS-18)
Olmsted single lamp street lights (SS-4)	Informational, traffic, and regulatory signage (SS-19, 20, 21)
	WW II Memorial interp. signage (SS-22)
	Traffic lights (SS-23)
	Timber fence at Survey Lodge (SS-25)

	Bollards (SS-26) Gates (SS-27) Hydraulic vehicle access gate (SS-28) Jersey barriers at base of monument (SS-29) Handrail at Monument Lodge (SS-30) Pedestal telephones (SS-31) Picnic tables (SS-33) Bike racks (SS-34) Concrete and wood slat backless benches (SS-8) Post and chain fencing (SS-24) Trash receptacles (SS-35)

VIEWS AND VISTAS

The intended views of the Washington Monument from the city and the vistas looking outward from the monument have been faithfully maintained through time. The monument is a dominant presence from any vantage point in the city, and the views between the monument and the White House, the Capitol, the Lincoln Memorial, and the Jefferson Memorial are as dramatic today as they were when the structures and memorials were first completed. Some of the views have been impacted by maturing trees, such as those along 14th Street that partially block views between the U.S. Capitol and the monument, although these do not particularly detract from the overall view.

L'Enfant's Vision

L'Enfant's proposed site for a monument honoring Washington assumed open vistas between the monument and the U.S. Capitol to the east and the monument and the White House to the north. Although the present monument does not sit on the exact point of intersection for the cross-axes of these two buildings, views towards the east and north remain unobstructed *(figures 3-10, 3-23, and 3-69).*

The Axial Plan

The completion of the Lincoln Memorial in 1921 and Reflecting Pool in 1924 added the western focal point for the axial plan envisioned by the McMillan Commission. Construction of the Jefferson Memorial, begun in 1938 and completed in 1943, completed the cross-axial plan. Presumably these two memorials could be viewed from the monument grounds and the monument could be viewed from them when completed. The view remains open between the Lincoln Memorial and the Washington Monument, but it is difficult to see the Jefferson Memorial from the monument grounds, except from the top of the obelisk *(figure 3-67).*

Summary: View and Vista Features

Contributing Features	Non-Contributing Features
Views from D.C. and region to monument (V-1) Views from the top of the monument to the surrounding city and important sites (V-2) Views from the site to the Lincoln Memorial, White House, Jefferson Memorial, and U.S. Capitol (V-3) Vistas of the monument from the Lincoln Memorial, White House, Jefferson Memorial, and U.S. Capitol (V-4) Screened views of site features (V-5) Axial views through Jefferson Pier of the White House and Jefferson Memorial (V-6)	

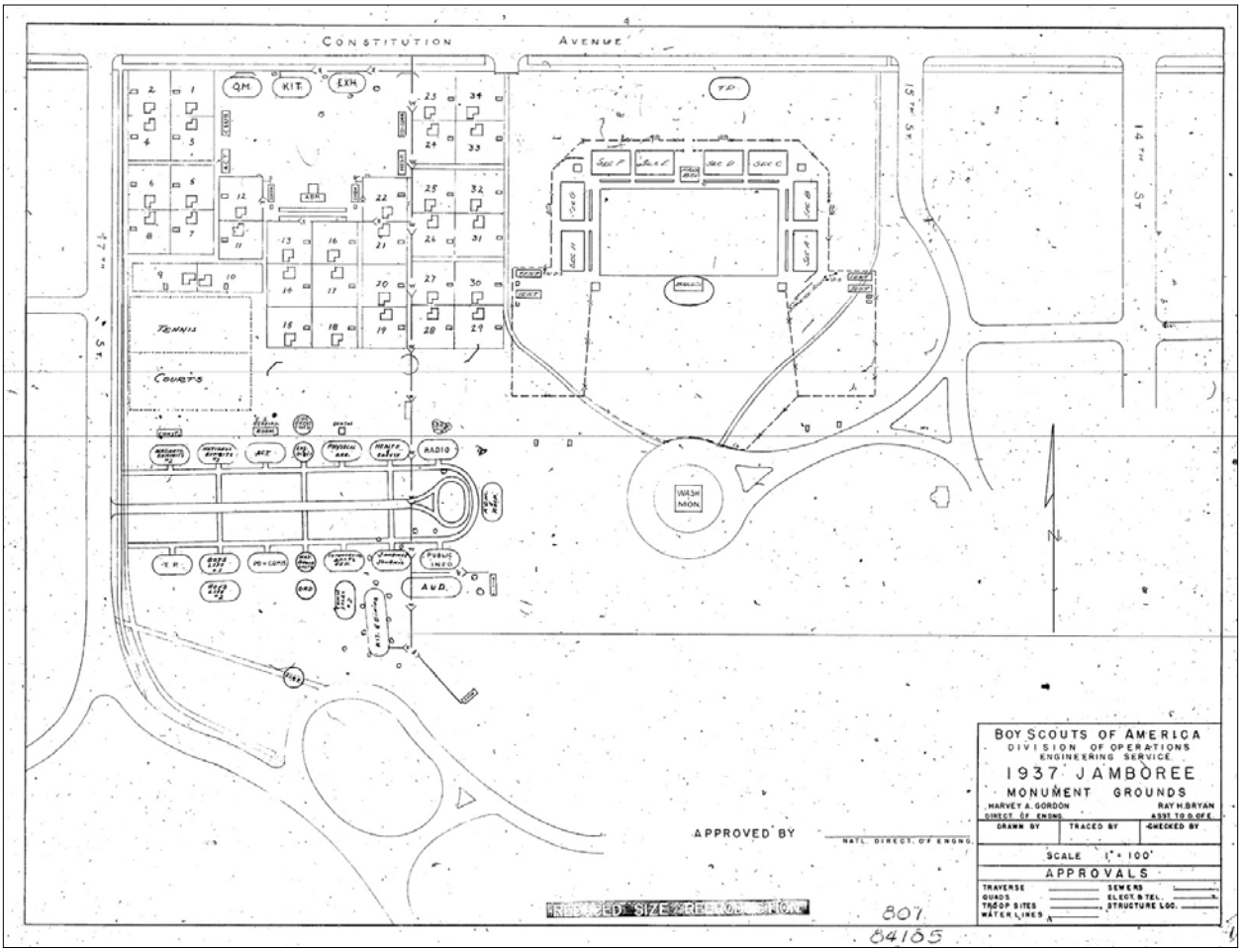
COMPARATIVE PHOTOGRAPHS

The following pages illustrate change over time on the monument grounds through a series of photographic comparisons between historic and existing views *(figures 4-9 through 4-22).*

ENDNOTES

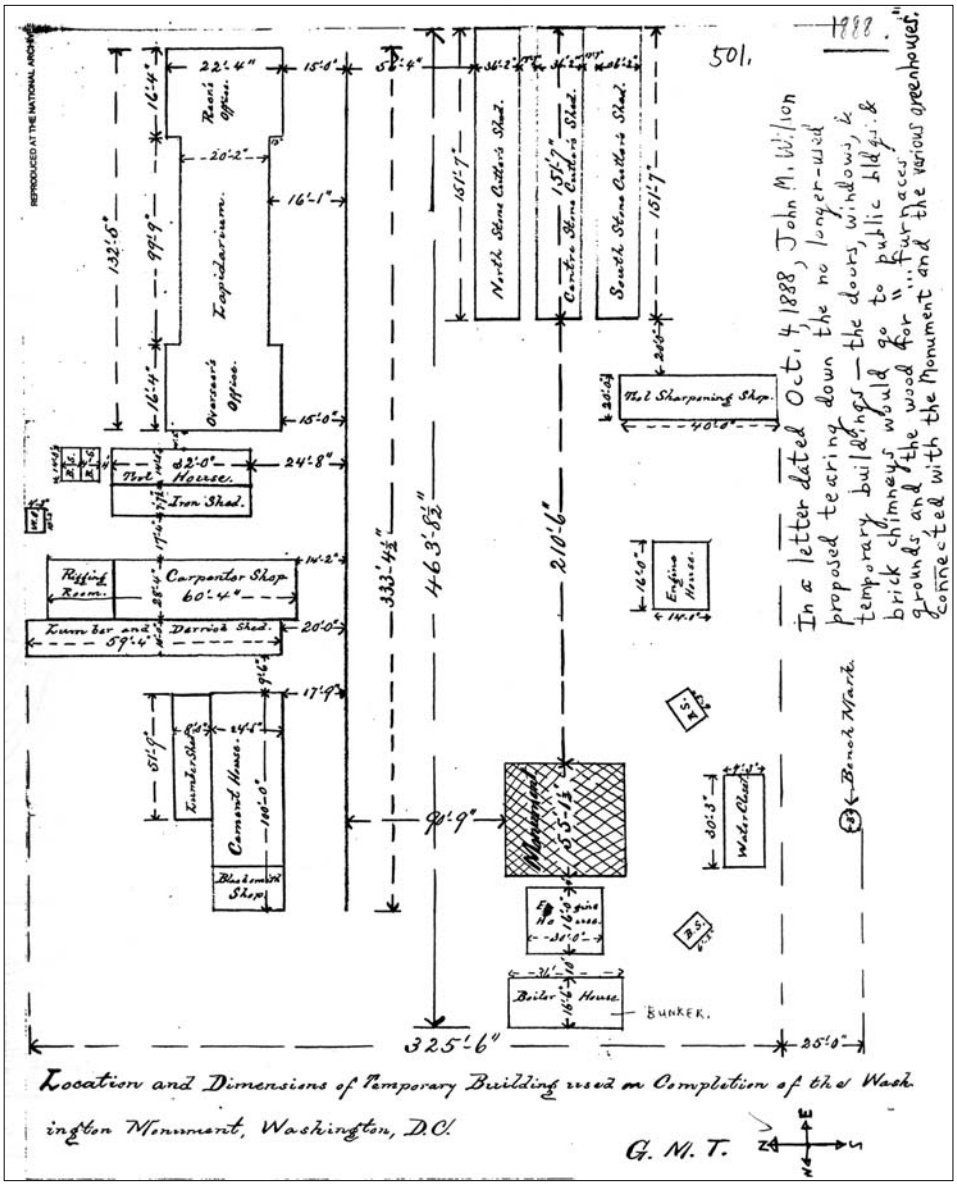
[1] U.S. Army Corps of Engineers, *Annual Report to the Chief of Engineers, U.S. Army* (Washington: Government Printing Office, 1874).
[2] Scott G. Shultz, *A General History of the West Potomac Park and Washington Monument Grounds Cultural Landscapes* (Washington: National Park Service, National Capital Parks–Central, 1995), 6.
[3] Carol B. Thompson, State Historic Preservation Officer for the District of Columbia, to Robert Stanton, Regional Director, National Capital Region, National Register Site, 12 May 1986.
[4] U.S. Army Corps of Engineers, Annual Report to the Chief of Engineers, US Army (Washington: Government Printing Office, 1875).
[5] NPS-NACC, *The NACC Cherry Tree Source Book, Draft* (Washington: Department of the Interior, 1996).
[6] National Park Service, "Decision Notice and finding of No Significant Impact, Washington Monument Permanent Security Improvements Environmental Assessment" (Washington: Department of the Interior, 2002), 6, 8.
[7] Friedel and Aikman, *George Washington, Man and Monument* (Washington: Washington National Monument Association 1988), 48-51.
[8] "Sketch of Monument Grounds," (NCP 807_84003, File 44-3), NPS-NCR Collection.
[9] E. K. Burlow, Administrative Assistant and Budget Officer to Arno B. Camerer, director, NPS. 15 January 1936. NPS-NCR Collection.
[10] Shultz, *Cultural Landscapes*, 9.
[11] National Park Service, *Cultural Landscape Report: West Potomac Park and Lincoln Memorial Grounds*, (Washington: National Capital Region, August 1999), 37, 106, 162.

LANDSCAPE ANALYSIS



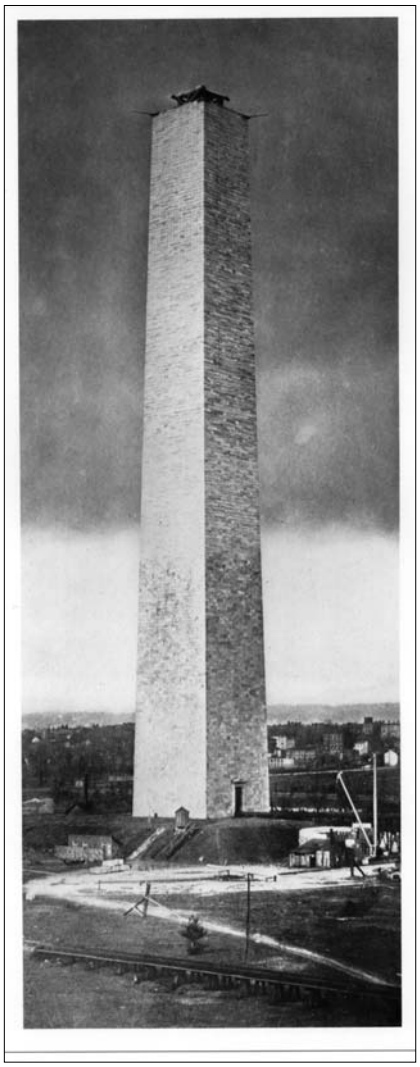
SOURCE: NPC NCR COLLECTION FILE: 807_84185

Figure 4-1. 1937 site plan for Boy Scout Jamboree.



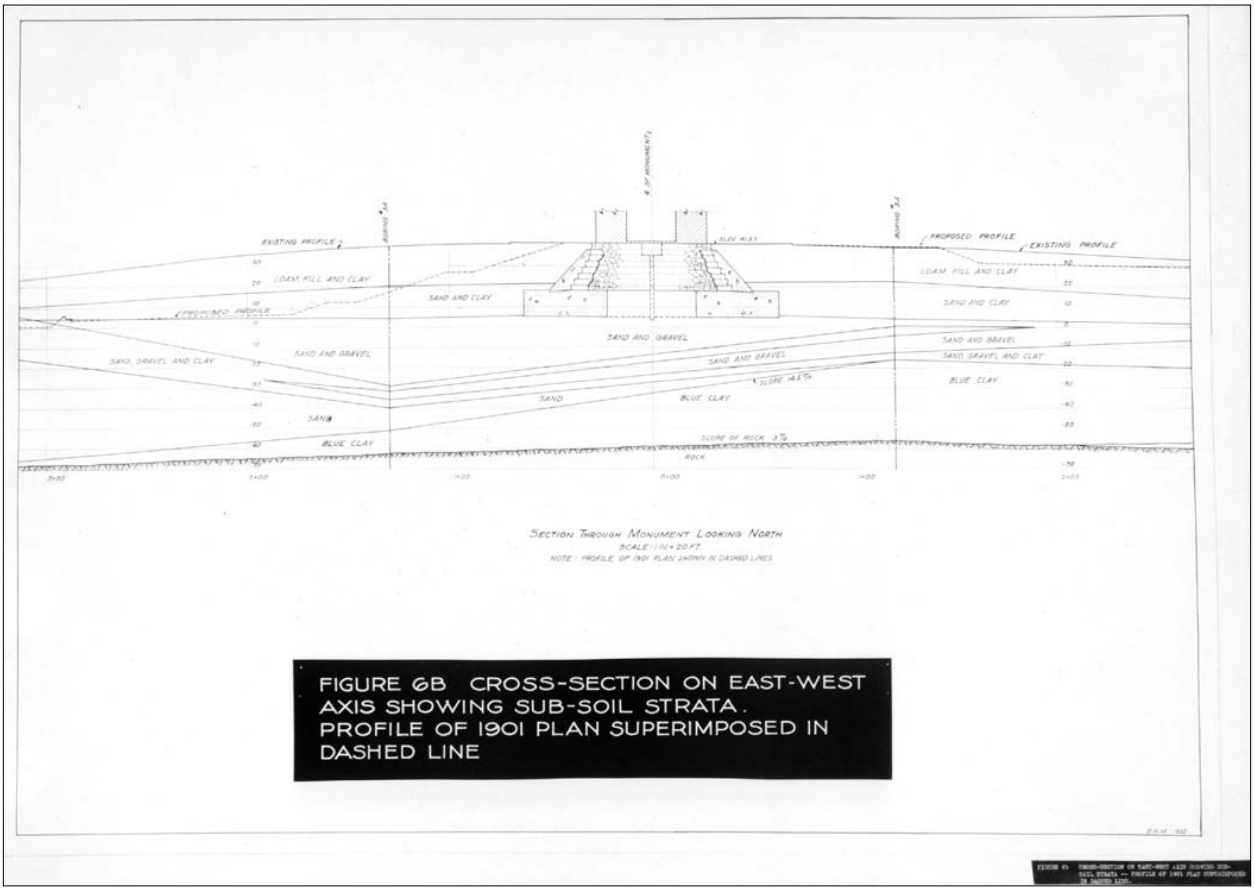
SOURCE: NPS-NCR "LOCHWOOD" FILES: ORIGINALLY FROM NARA

Figure 4-2. 1888 diagram showing construction buildings.



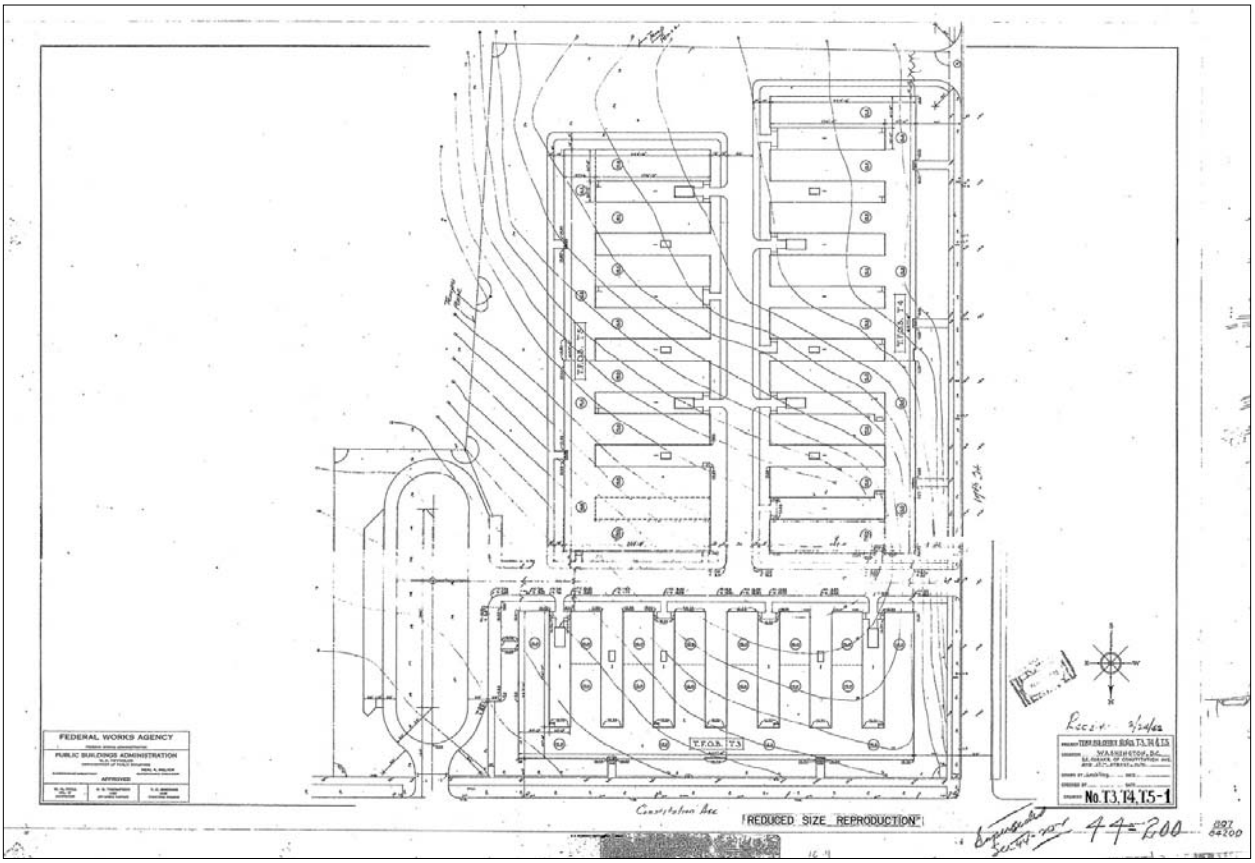
SOURCE: LIBRARY OF CONGRESS

Figure 4-3. 1870s photograph of partial monument.



SOURCE: NATIONAL ARCHIVES, RG42

Figure 4-4. Section comparing sub-layers of fill within Washington Monument mound.



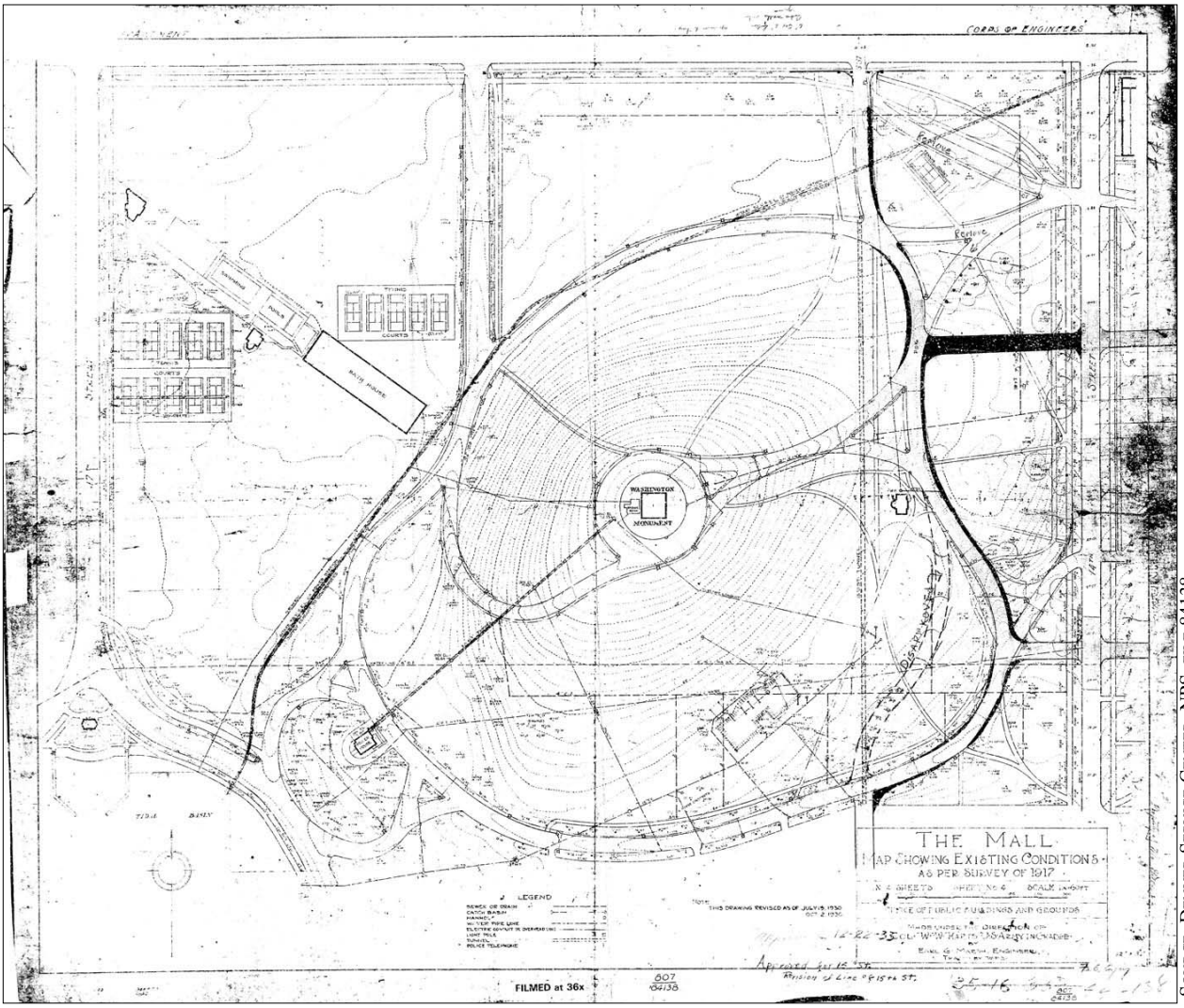
SOURCE: NPC NCR COLLECTION FILE: 807_84200

Figure 4-5. 1943 plan showing temporary buildings and parking lot at the 16th Street alignment.



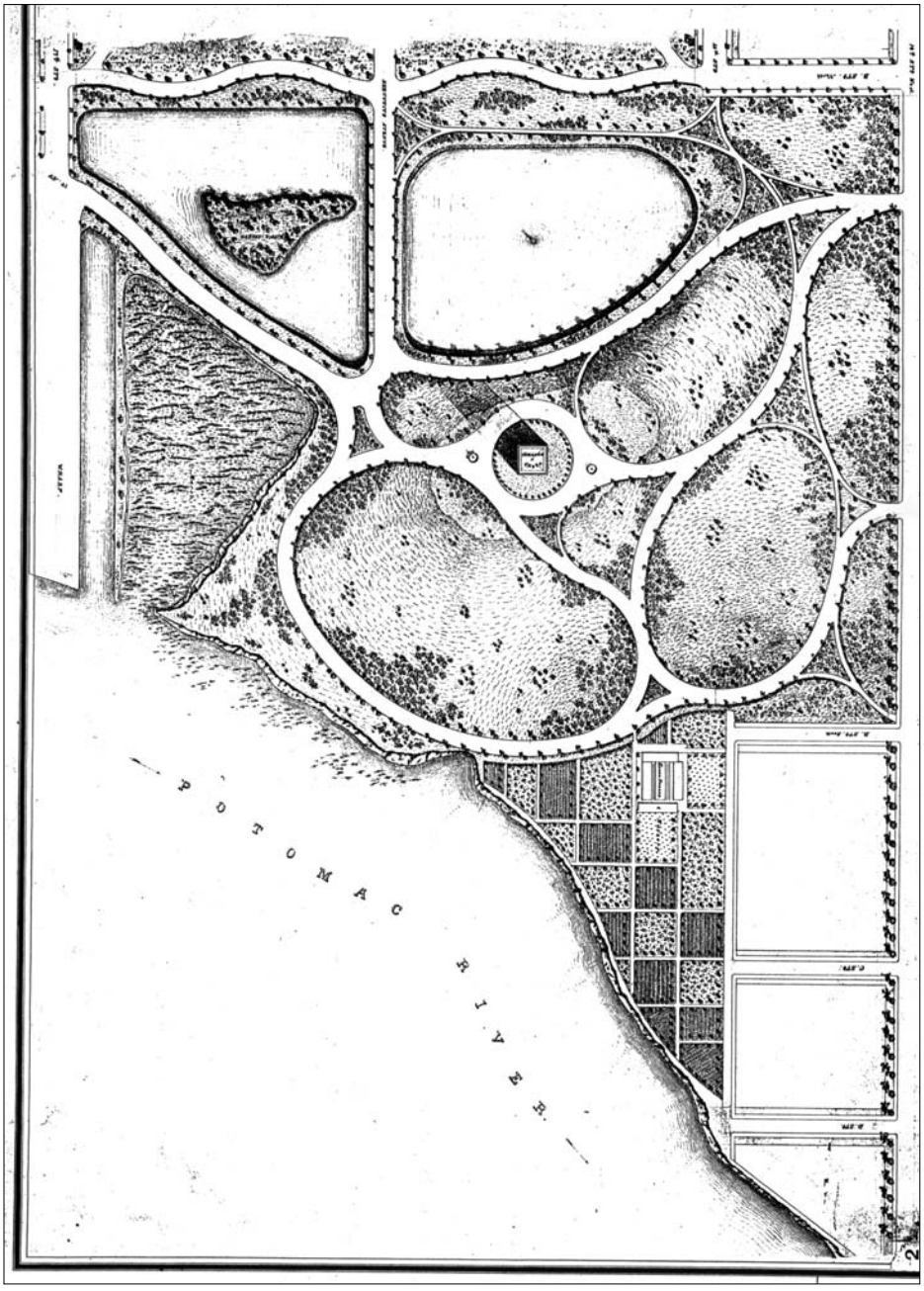
SOURCE: LIBRARY OF CONGRESS

Figure 4-6. 1884 view of Washington, D.C., by Adolf Sachse, detail.



SOURCE: DENVER SERVICE CENTER, NPS, FILE 84138

Figure 4-7. Site plan of existing conditions showing tennis courts, ca. 1917.



SOURCE: NARA RG 79 NCP 807, F44--45

Figure 4-8. 1870s plan showing unimplemented plan for grounds, with Babcock Lake.

COMPARATIVE PHOTOGRAPHS



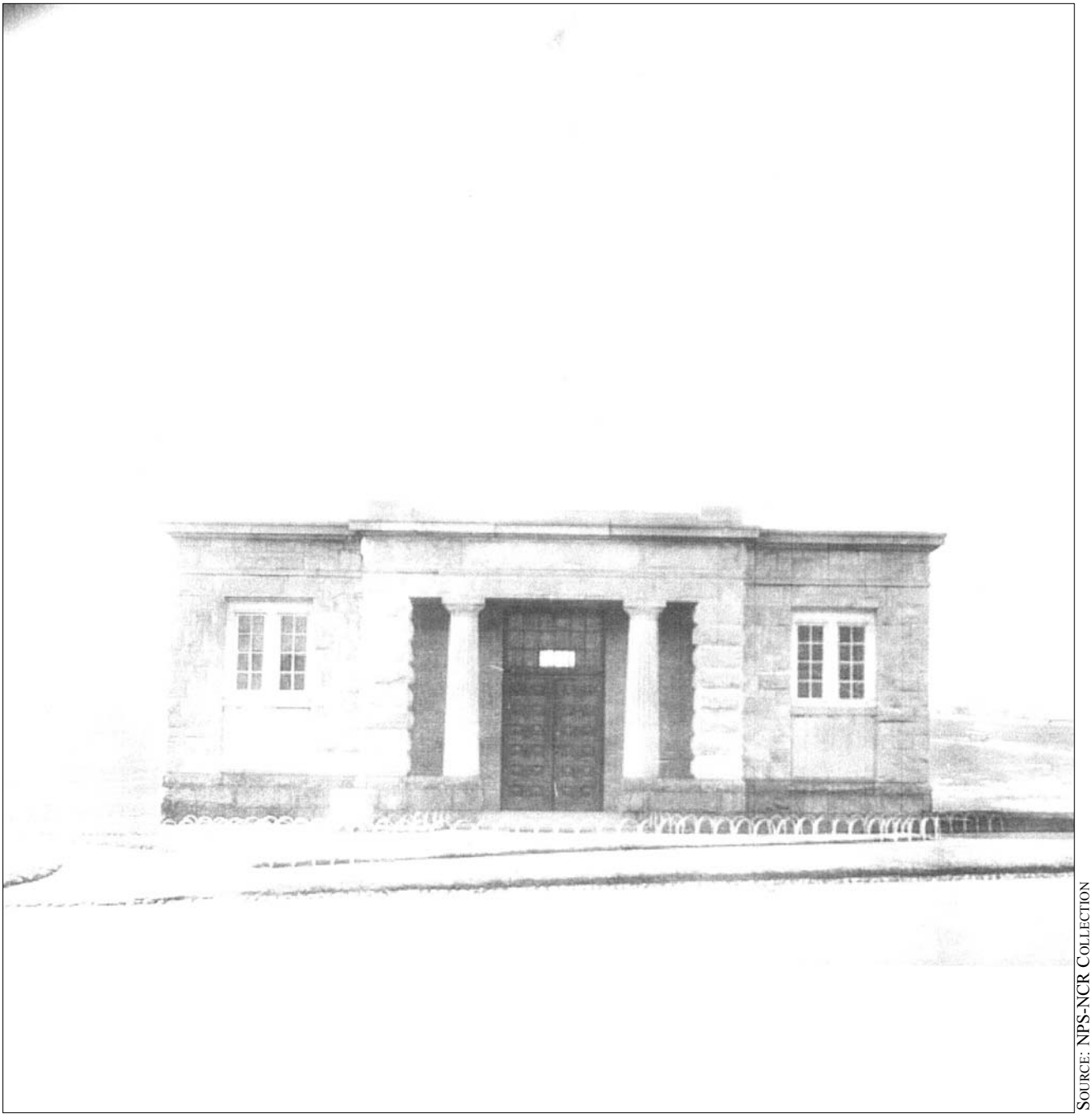
SOURCE: EVENING STAR, MAY 1945, PHOTO BY GENE ABBOTT, WHS 1821

Figure 4-9a. (*Evening Star* May 1945 WHS 1821) 1945 view of Jefferson Pier. This looks toward the monument with the Capitol in the background. Note path and fencing, cars parked around the monument.



SOURCE: JOHN MILNER ASSOCIATES, INC. 2003

Figure 4-9b. (H-14) 2003 view of same.



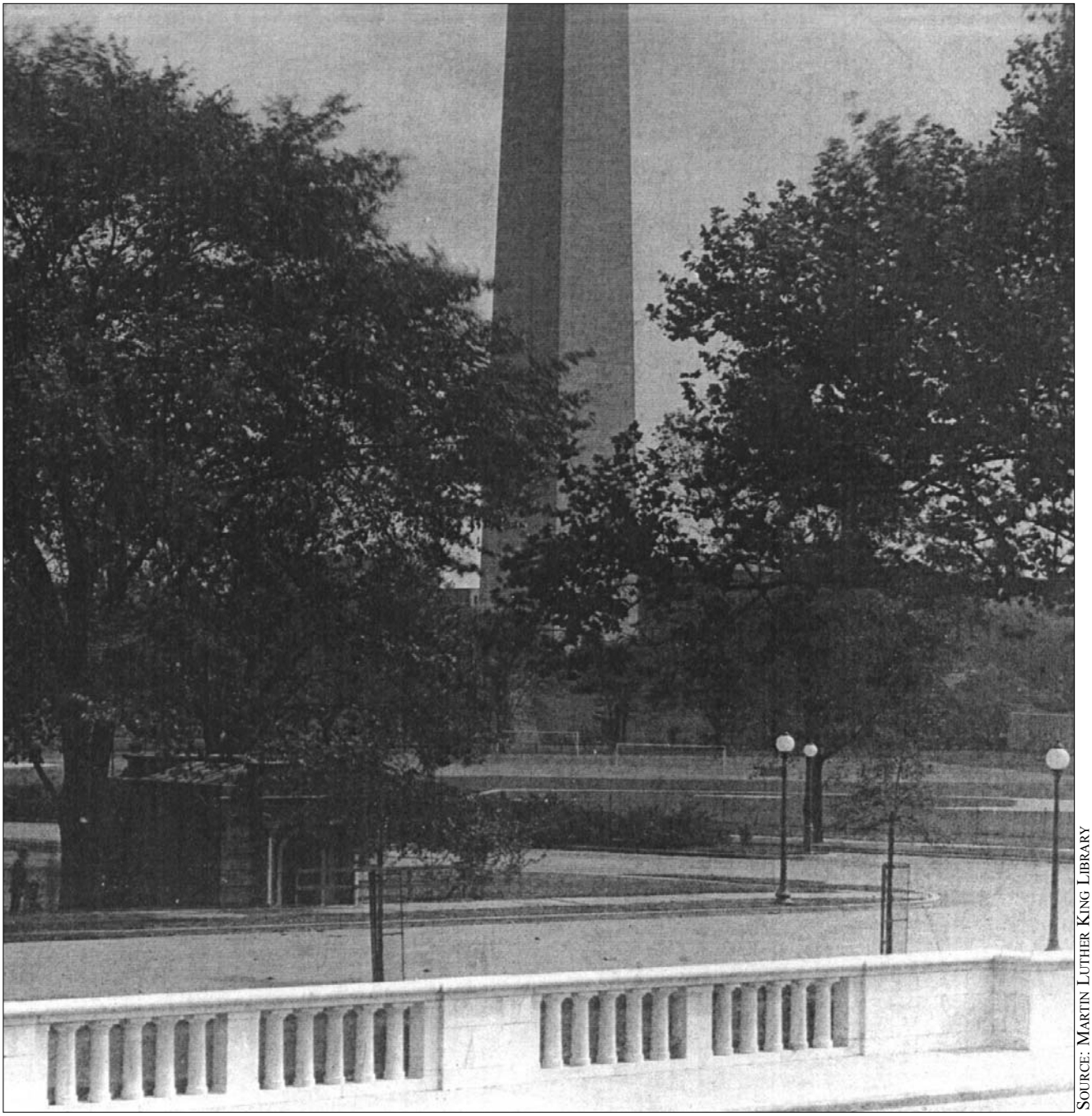
SOURCE: NPS-NCR COLLECTION

Figure 4-10a. 1926 view of Monument Lodge.



SOURCE: JOHN MILNER ASSOCIATES, INC., 2003

Figure 4-10b. (H-2) 2003 view of same.



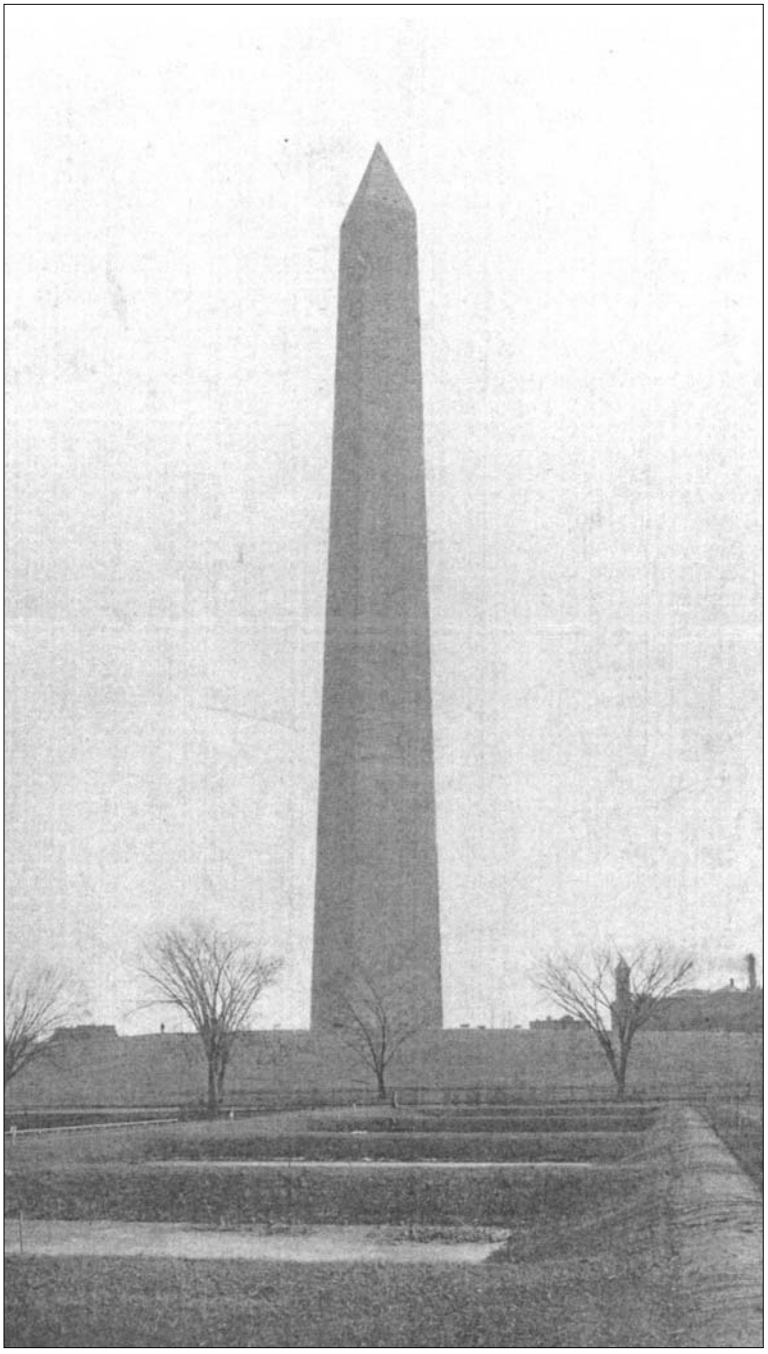
SOURCE: MARTIN LUTHER KING LIBRARY

Figure 4-11a. (MLK 5739) View towards the monument with tennis courts, n.d.



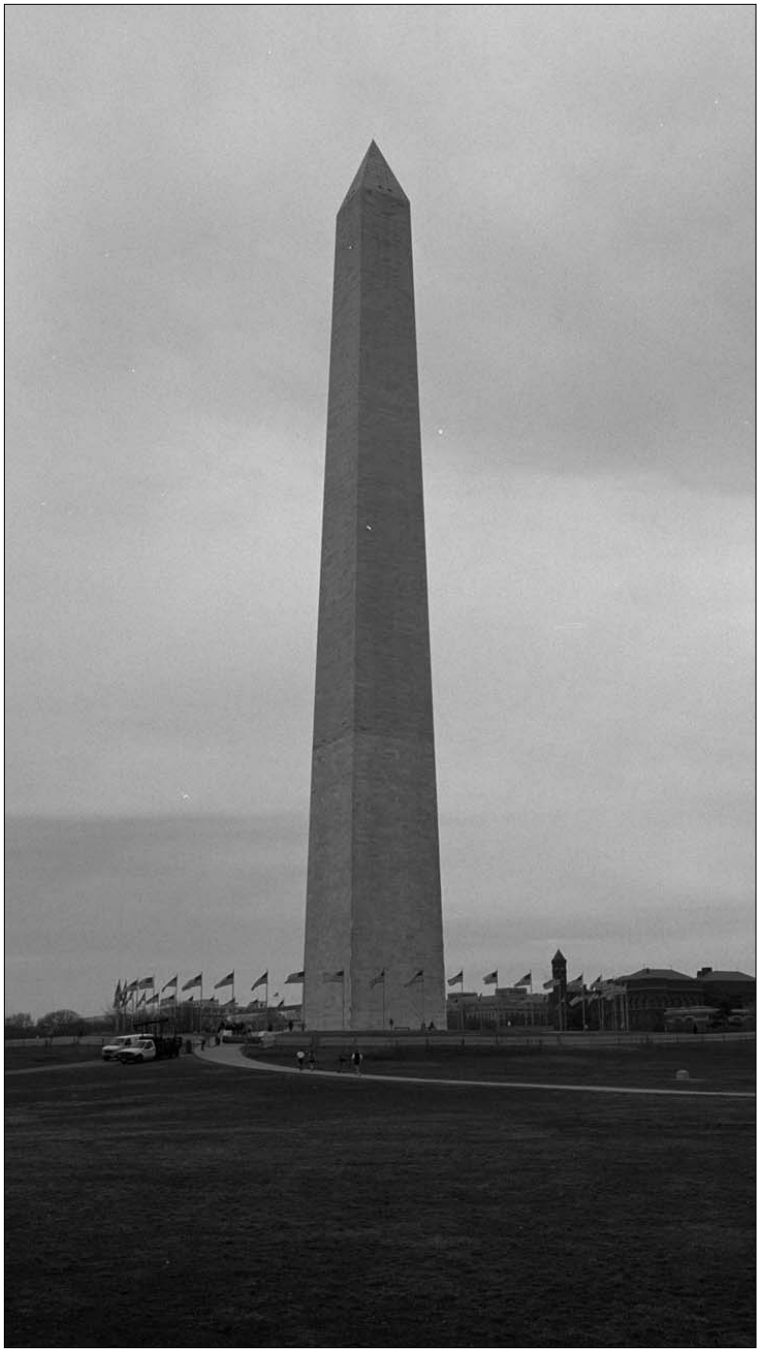
SOURCE: JOHN MILNER ASSOCIATES, INC., 2003

Figure 4-11b. (H-17) 2003 view of same.



SOURCE: *INAUGURATIONS AND THE CITY OF WASHINGTON*, 1901, MLK 13210 AND 14091, ALSO LC-USZ62-59535

Figure 4-12a. (LC-USZ62-59535) 1901 view across the fish ponds toward the monument.



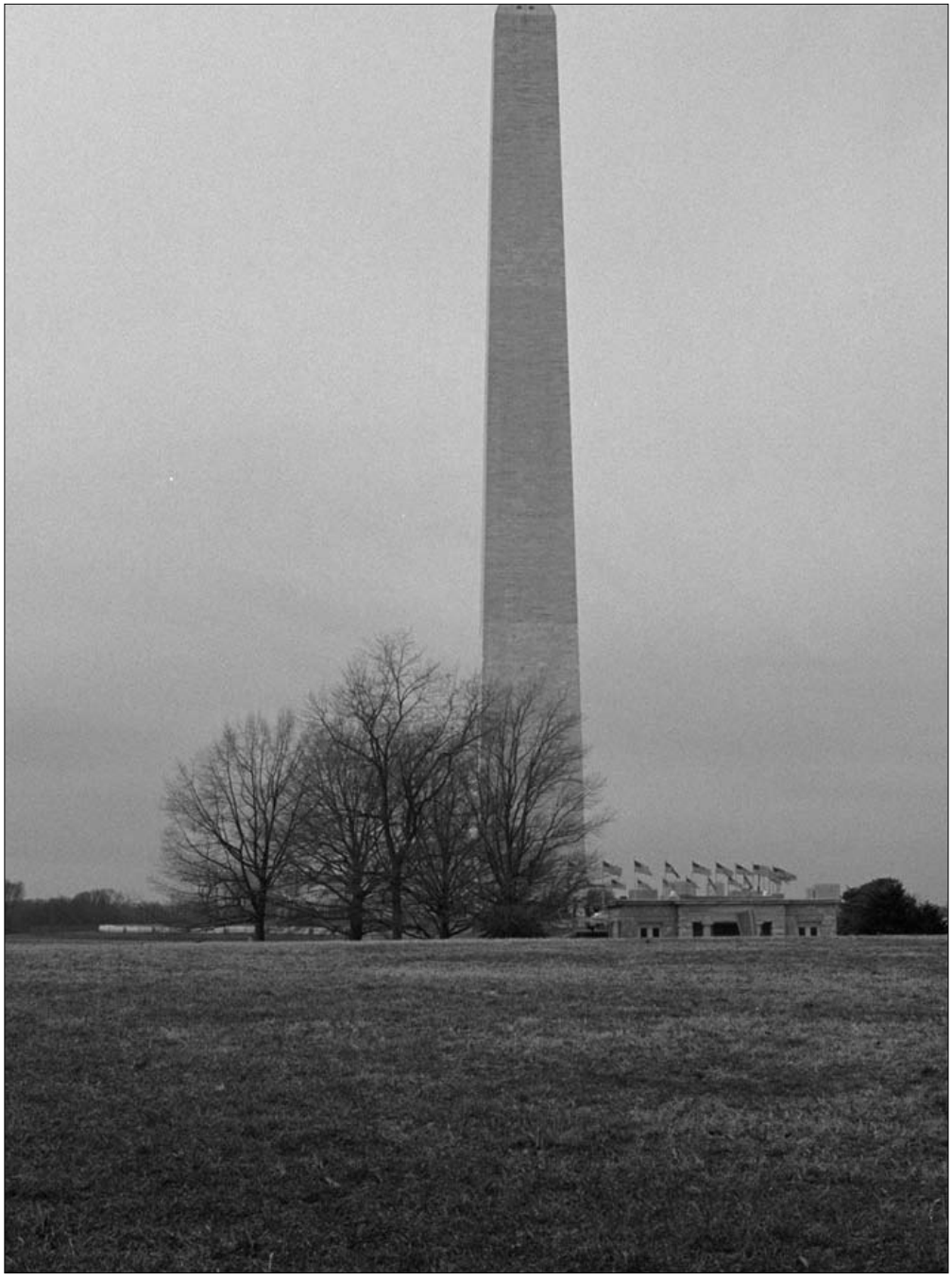
SOURCE: JOHN MILNER ASSOCIATES, INC., 2003

Figure 4-12b. (H-19) 2003 view of the same.



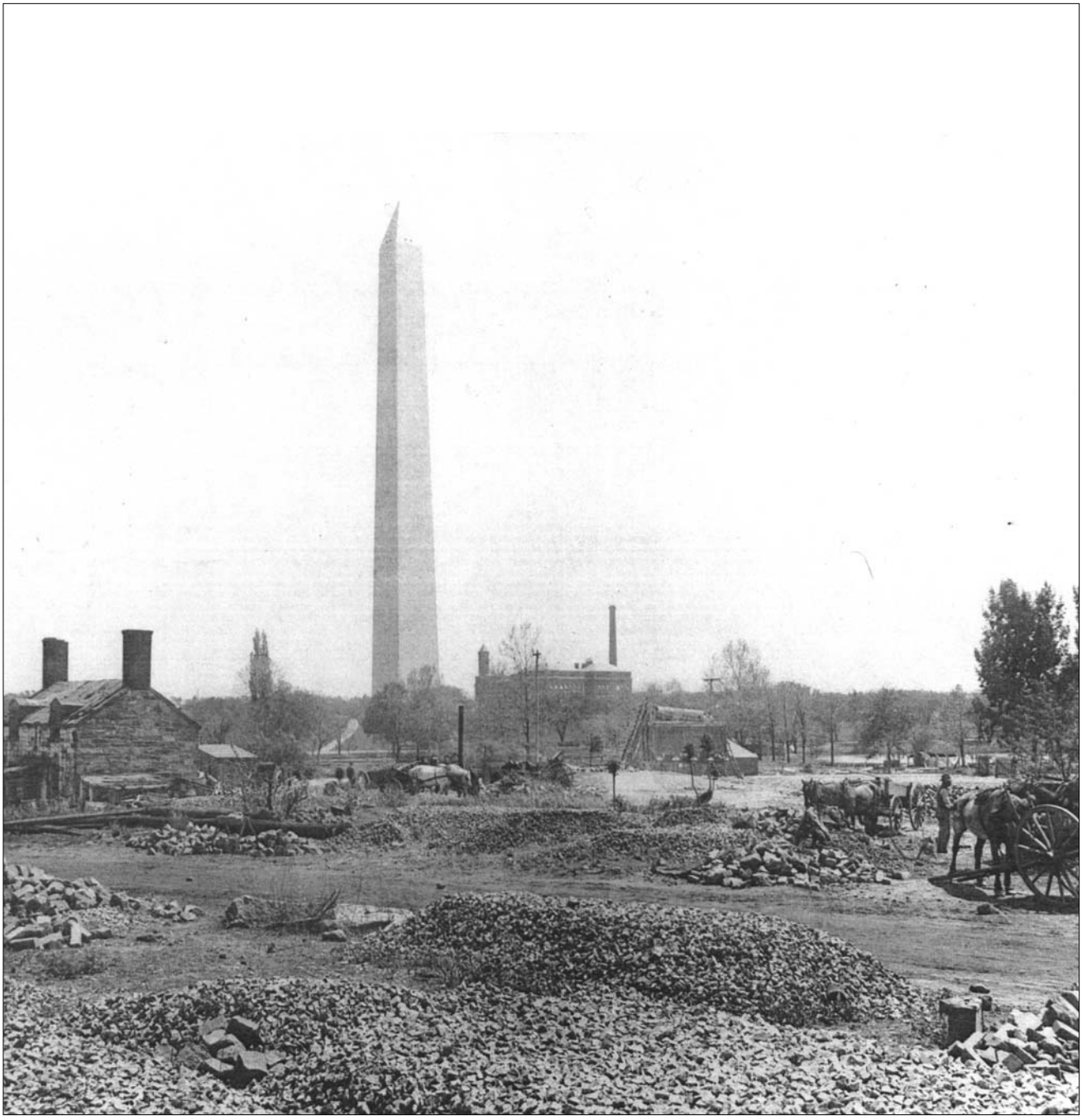
SOURCE: POSTCARD PUBLISHED BY NATIONAL ARCHIVES, 1978, WHS 8924

Figure 4-13a. (WHS 8924) 1890s postcard view of the Washington Monument and Monument Lodge.



SOURCE: JOHN MILNER ASSOCIATES, INC., 2003

Figure 4-13b. (H-7) 2003 view of the same. Note the newly constructed berm along 15th Street blocking a portion of the view.



SOURCE: WASHINGTON HISTORICAL SOCIETY, ACCESSION #8925

Figure 4-14a. (WHS8925) View towards the monument from Constitution Avenue, n.d.



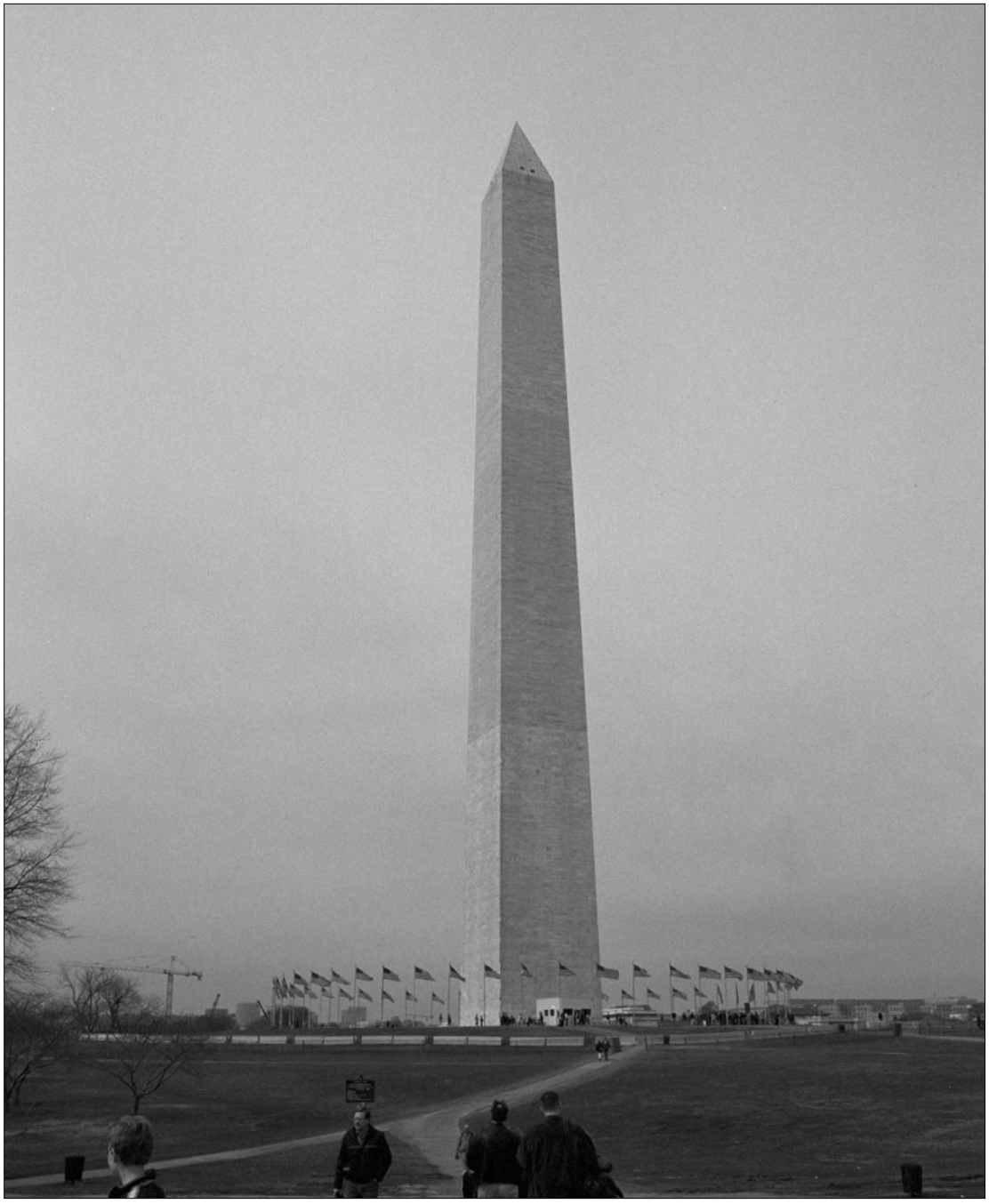
SOURCE: JOHN MILNER ASSOCIATES, INC., 2003

Figure 4-14b. (H-16) 2003 view of the same.



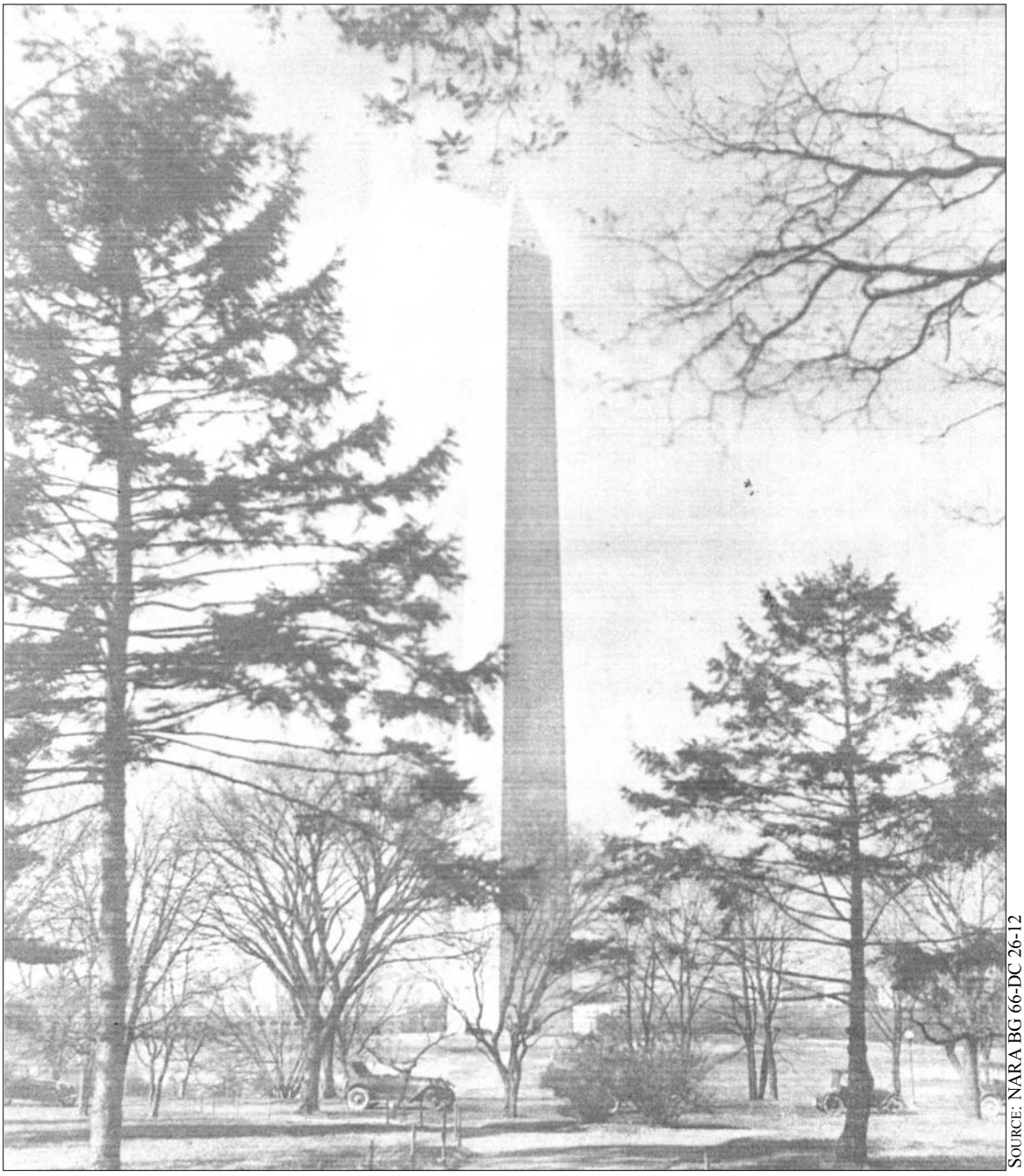
SOURCE: MLK LIBRARY COLLECTION, 5795

Figure 4-15a. (MLK 5795) 1920s view of the Washington Monument and grounds with cars at base.



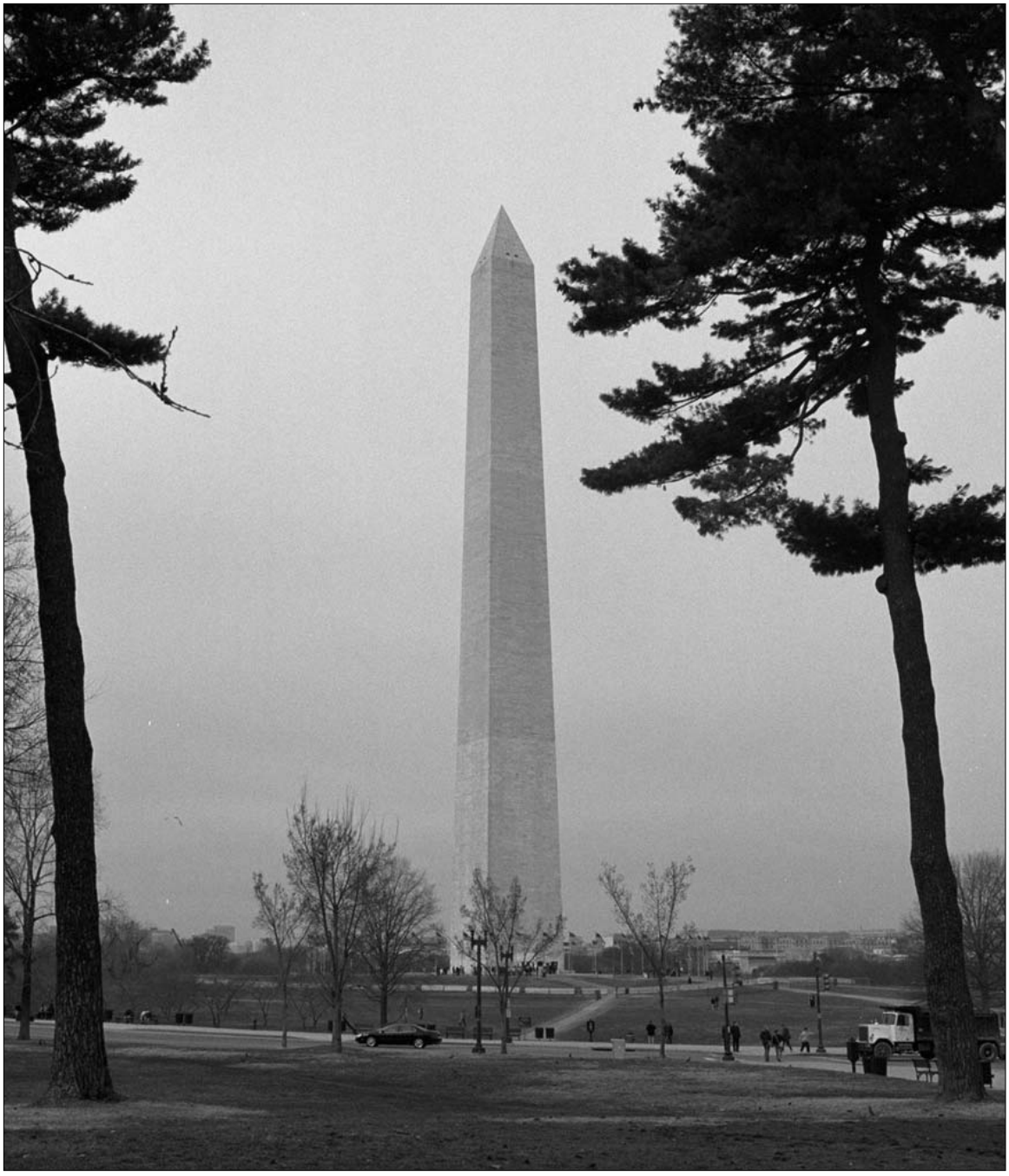
SOURCE: JOHN MILNER ASSOCIATES, INC., 2003

Figure 4-15b. (H-10) 2003 view of the same. Note ring of flagpoles at the base, and that the grounds are not accessible to vehicles.



SOURCE: NARA BG 66-DC 26-12

Figure 4-16a. (NARA BG 66-DC 26-12)1920s view looking northwest toward the monument.



SOURCE: JOHN MILNER ASSOCIATES, INC., 2003

Figure 4-16b. (H-4) 2003 view of the same.



SOURCE: THEODORE HORYDCZAK, LC-H814-T-M04-085

Figure 4-17a. (Theodore Horydczak, LC-H814-T-M04-085) 1953 view towards the monument from 14th Street.



SOURCE: JOHN MILNER ASSOCIATES, INC., 2003

Figure 4-17b. (H-5) 2003 view of the same.



SOURCE: WASHINGTON TRAVELOTO, 1931, CONINE AND MILNER, CHICAGO, MLK, NO NEGATIVE NUMBER

Figure 4-18a. (Wash Travoto 1931) 1931 view of the monument and grounds from 14 th Street near Madison Drive.



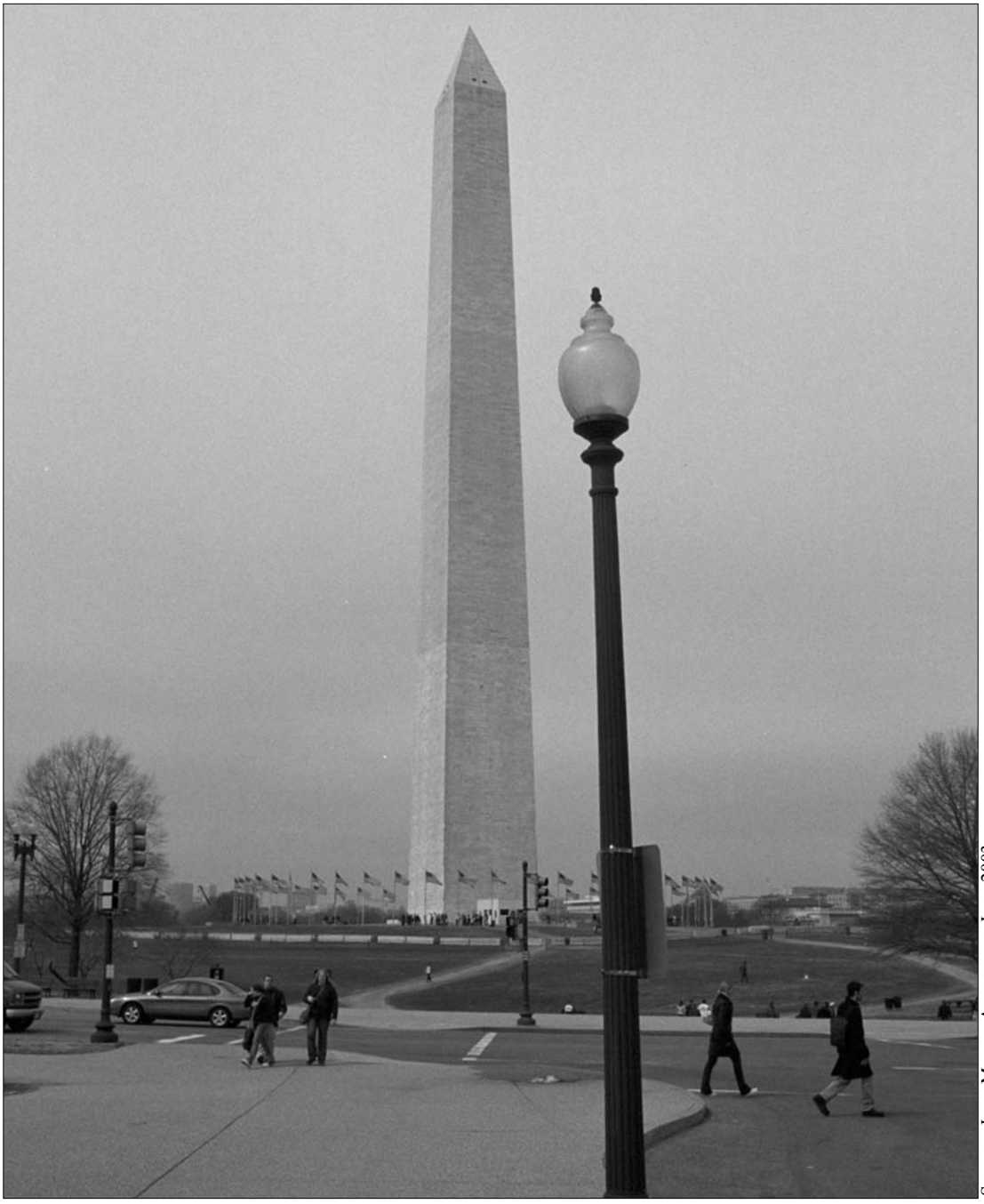
SOURCE: JOHN MILNER ASSOCIATES, INC., 2003

Figure 4-18b. (H-14) 2003 view of the same.



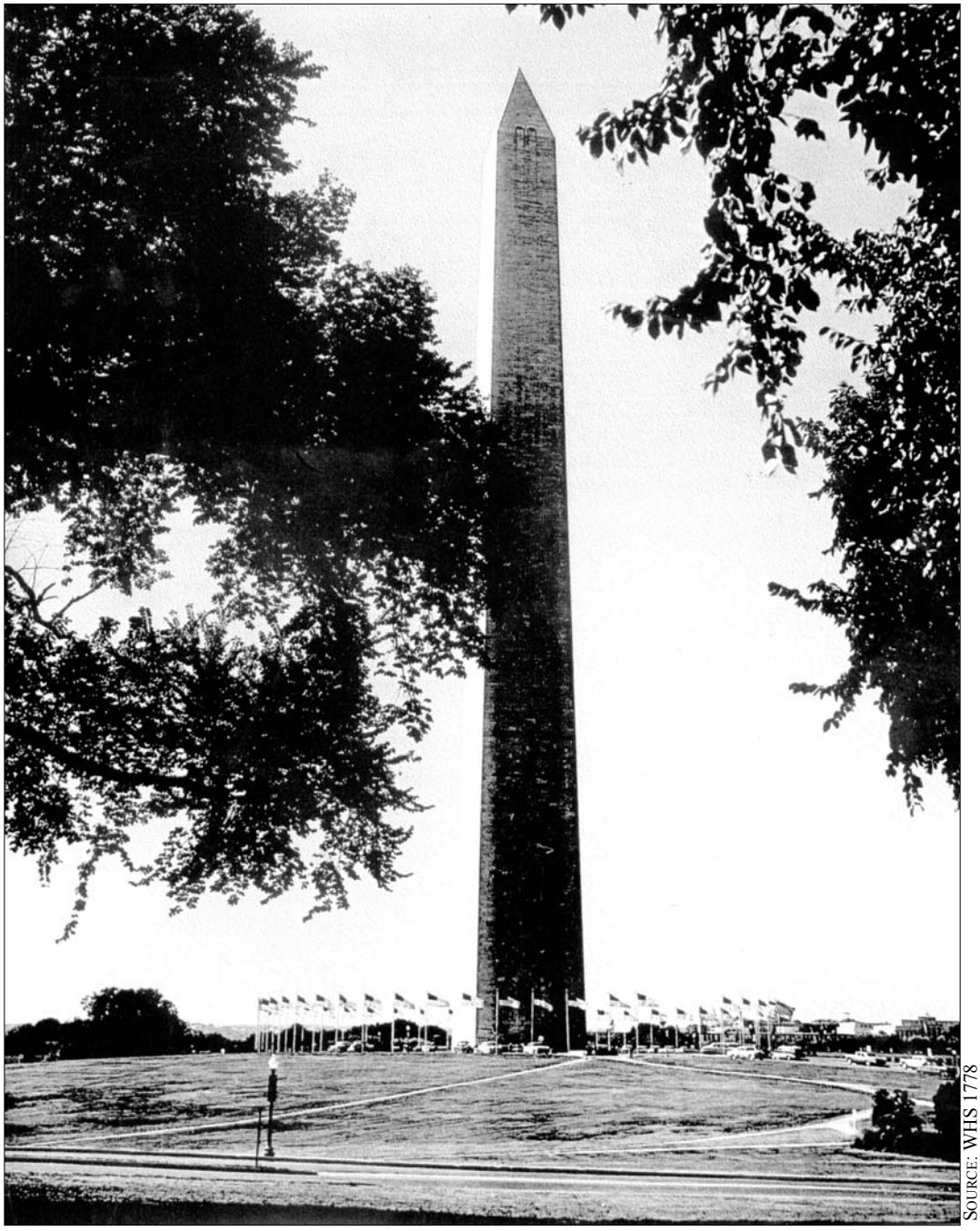
SOURCE: WHS 1250, 1 OF 2 VIEWS

Figure 4-19a. (WHS 1250) 1937 view looking west toward the monument from Jefferson Drive.



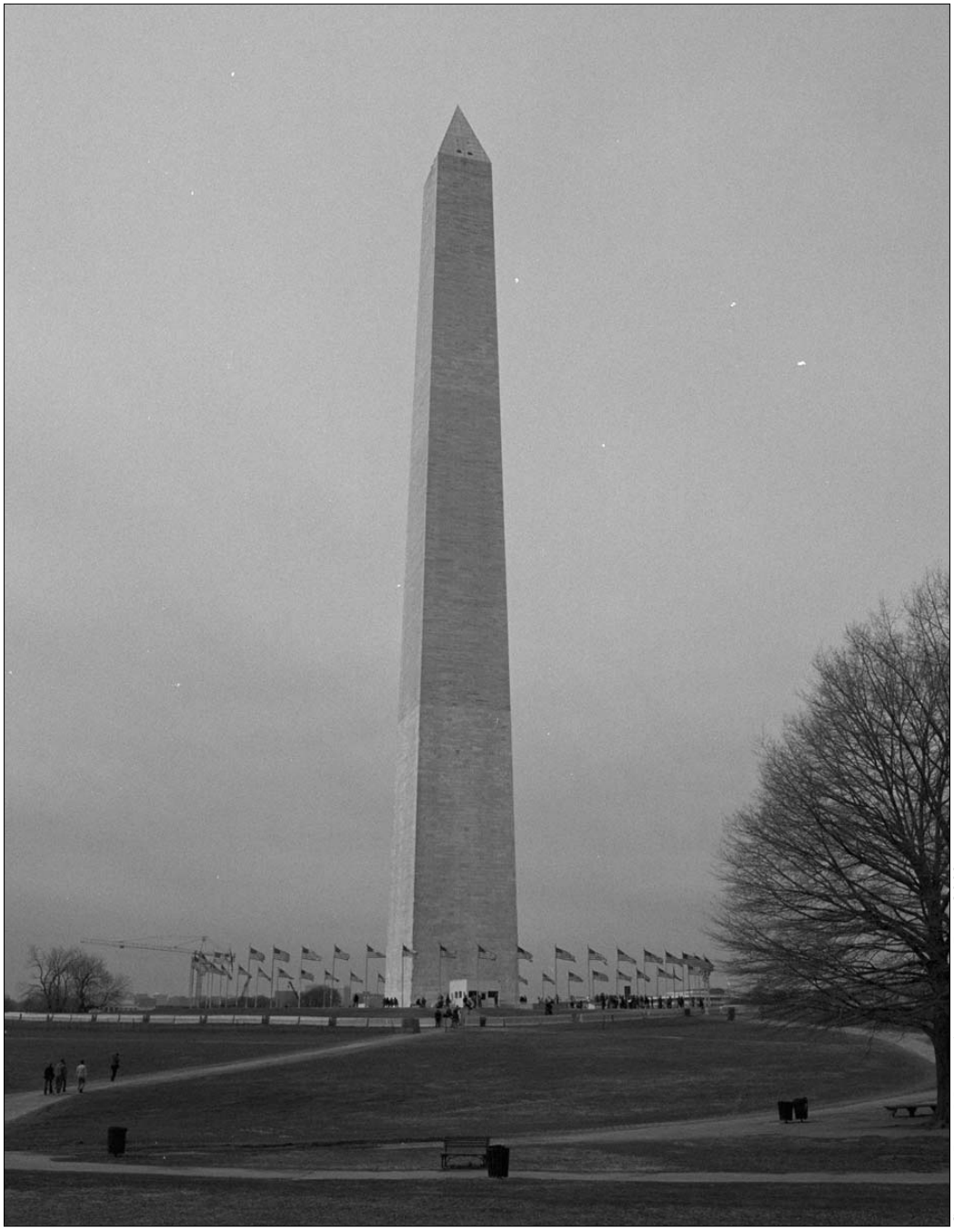
SOURCE: JOHN MILNER ASSOCIATES, INC., 2003

Figure 4-19b. (H-6) 2003 view of the same.



SOURCE: WHS 1778

Figure 4-20a. (WHS 1778) 1950s view of the monument from the southeast, south of Monument Lodge.



SOURCE: JOHN MILNER ASSOCIATES, INC., 2003

Figure 4-20b. (H-9) 2003 view of the same.



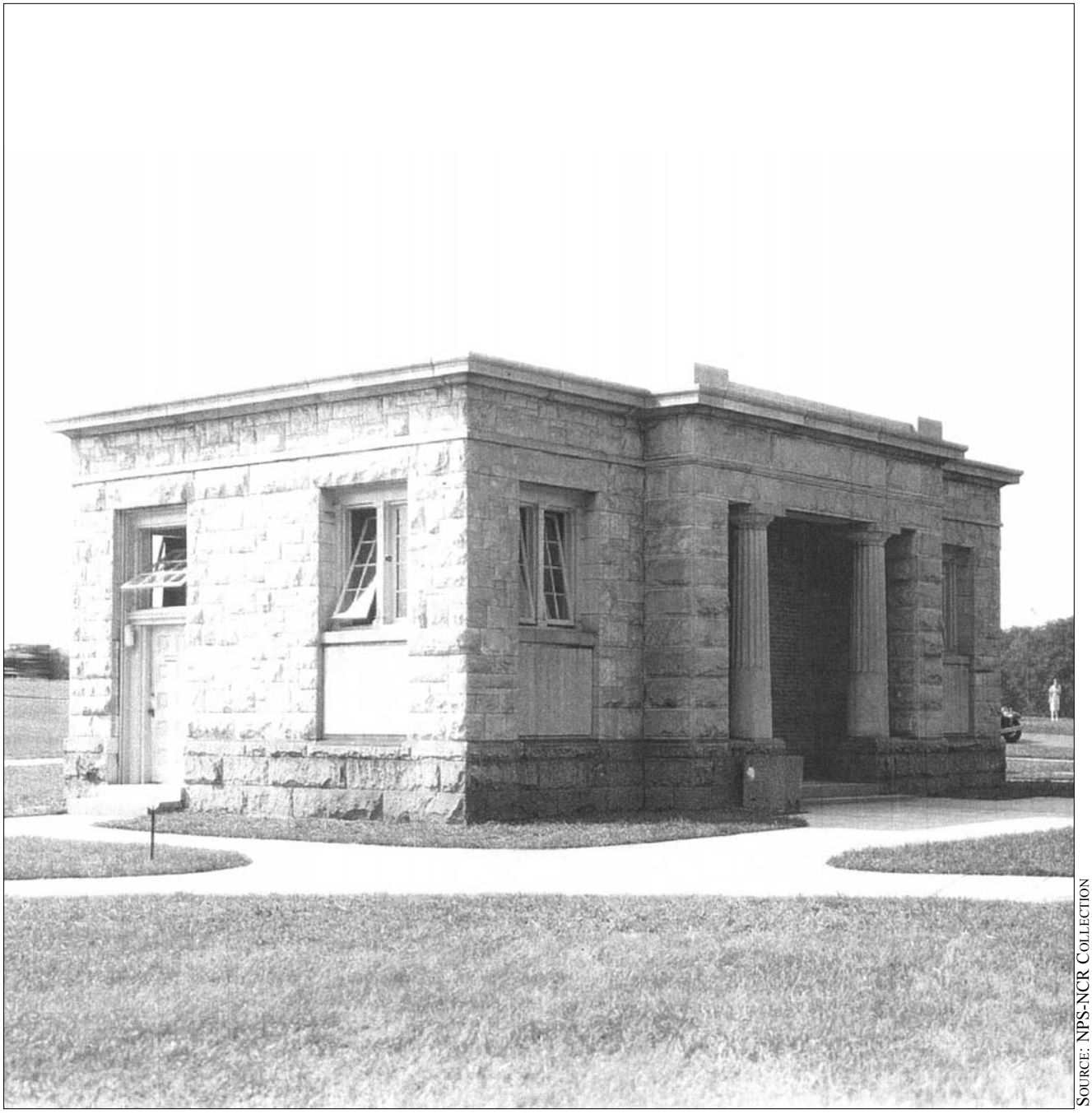
SOURCE: NPS-NCR COLLECTION

Figure 4-21a. (MonLodge_1932) 1932 view of the northwest corner of Monument Lodge.



SOURCE: JOHN MILNER ASSOCIATES, INC., 2003

Figure 4-21b. (H-1) 2003 view of the same.



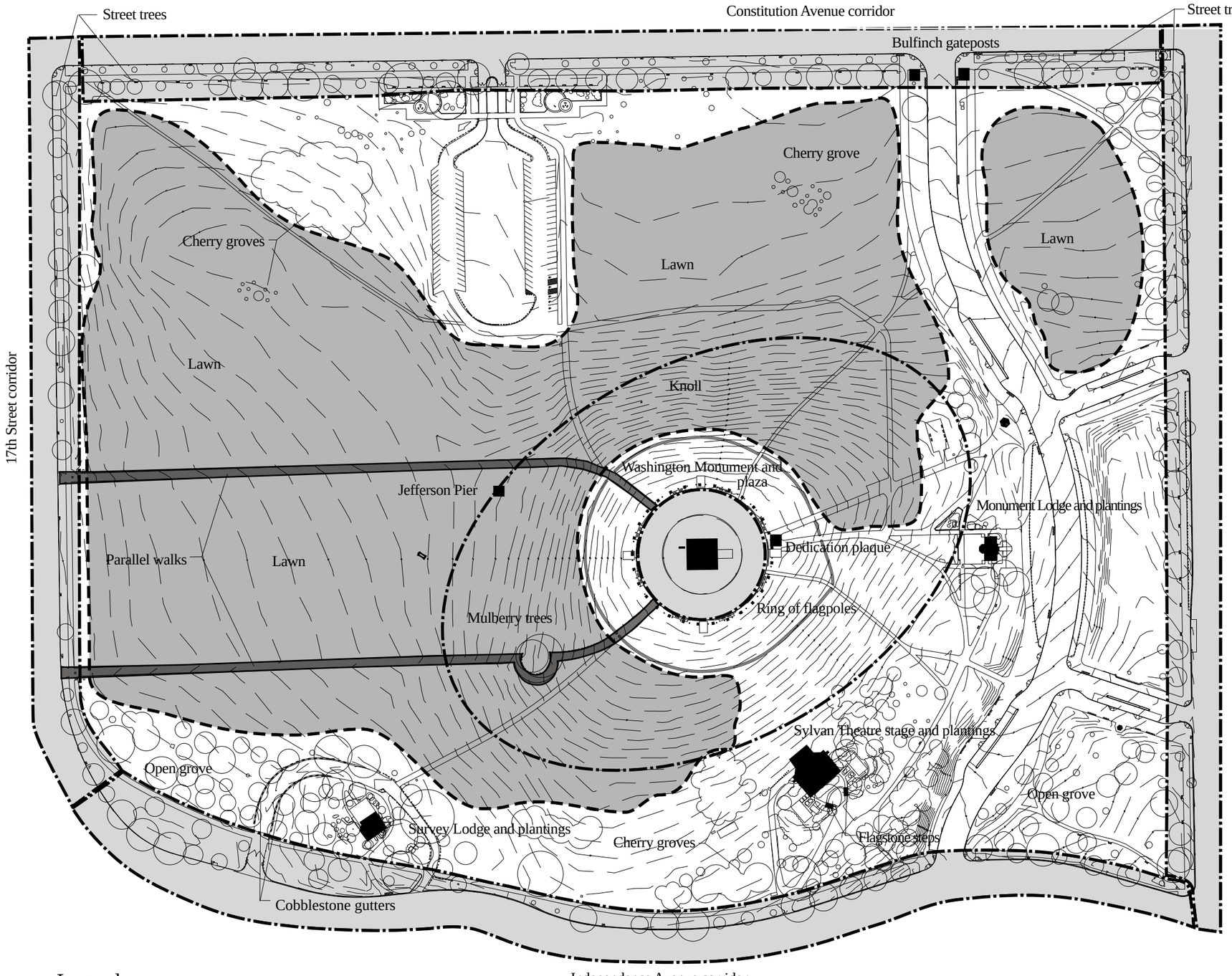
SOURCE: NPS-NCR COLLECTION

Figure 4-22a. (MonLodge_1931) 1931 view of the southeast corner of Monument Lodge.



SOURCE: JOHN MILNER ASSOCIATES, INC., 2003

Figure 4-22b. (H-3) 2003 view of the same.



LAND USE
Commemorative
Recreational
Public Gathering
Visitor Services

TOPOGRAPHY
The Mound (T-1)
The Flats (T-2)
Berm between 14th and 15th Streets (T-3)

CIRCULATION
17th Street corridor, including sidewalks (C-1)
Constitution Avenue corridor, including sidewalks (C-2)
14th Street corridor, including sidewalks (C-3)
Independence Avenue corridor, including sidewalks (C-4)
Flagstone steps at the Sylvan Theatre (C-5)
Walks between the monument and 17th Street (C-6)
Monument plaza (C-11)

VEGETATION
Lawn (Ve-1)
Grove of mulberry trees (Ve-2)
Street trees along 17th Street (Ve-3)
Street trees along Constitution Avenue (Ve-4)
Street trees along 14th Street (Ve-5)
Open groves (Ve-10)
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BUILDINGS AND STRUCTURES
Washington Monument (B-1)
Monument Lodge (B-2)
Survey Lodge (B-4)
Jefferson Pier survey marker (S-1)
Sylvan Theatre stage (S-2)
Bulfinch gateposts (S-3)

SMALL-SCALE FEATURES
Elevation obelisk (SS-1)
Twin Twenty double lamp street lights (SS-2)
Cast iron and wood slat benches (SS-7)
Ring of flagpoles (SS-9)
Dedication plaque at monument base (SS-5)
Cast iron fencing (SS-10)
Stone-lined drainage ditch (SS-32)
Washington Globe single lamp street lights (SS-3)
Olmsted single lamp street lights (SS-4)

VIEWS
Views from D.C. and region to monument (V-1)
Views from the top of the monument to the surrounding city and important sites (V-2)
Views from the site to the Lincoln Memorial, White House, Jefferson Memorial, and U.S. Capitol (V-3)
Vistas of the monument from the Lincoln Memorial, White House, Jefferson Memorial, and U.S. Capitol (V-4)
Screened views of site features (V-5)
Axial views through Jefferson Pier of the White House and Jefferson Memorial (V-6)

N
0 50 100 200 FEET

NPS Drawing No. 804 / 84492

Map 4-1

Contributing Landscape Features

Washington Monument Grounds
Cultural Landscape Report
Washington, DC - National Park Service

CHAPTER FIVE

NATIONAL REGISTER STATUS

CHAPTER FIVE

NATIONAL REGISTER STATUS

INTRODUCTION

This chapter summarizes the current and potential National Register significance of the Washington Monument Grounds property and assesses the integrity of the project area based upon the significance evaluation. The information included below is derived from review of available National Register documentation for the Washington Monument Grounds and the comparative analysis of historic and existing site conditions prepared as part of this Cultural Landscape Report (CLR). Conveyed within this chapter are the known National Register-recognized areas, aspects, and periods of site significance, and suggestions for additional aspects of significance to be considered by the National Park Service (NPS) in future National Register nominations. This significance evaluation information is not intended to replace a Determination of Eligibility or to serve as the basis for a National Register nomination. It is instead one of the tools used in preparing a CLR, and to identify contributing and non-contributing site resources. The knowledge gained through preparation of significance evaluation information is integral to preparing the treatment plan portion of a CLR. Although this CLR does not include a treatment plan, the chapter that follows addresses future management of the Washington Monument Grounds, taking into consideration the significance evaluation information included within this chapter.

The Washington Monument Grounds is already listed in the National Register of Historic Places. The 1980 National Register nomination for the property indicates that the site possesses national significance as a historic designed landscape under National Register Criteria C within the areas of Architecture, Community Planning and Development, Engineering, and Landscape Architecture, during the period 1848-1889. The 1980 National Register documentation for the monument also cites the monument "as a major example of 19th-century Egyptian Revival architecture."[1]

A National Register nomination, prepared in 1994 for the L'Enfant Plan of the City of Washington, D.C., also addresses the significance of the Washington Monument Grounds, which are a contributing resource of the property. This nomination found Washington, D.C.'s, Monumental Core to be nationally significant under National Register Criteria A within the areas of Politics/Government, Social History, and Commemoration, also during the period 1791 through 1943. The Washington Monument Grounds are important for their role as the nation's foremost memorial to its first president and as a pivotal and symbolic feature in the urban design of the nation's capital. This significance extends from the initial conception of the National Mall

area design by Pierre Charles L'Enfant in 1791, with its centrally placed equestrian statue of George Washington, through the completion of the Jefferson Memorial in 1943.

Also listed individually in the National Register are the two gateposts that frame the entrance into the monument grounds at 15th Street. These gateposts are part of a system of similar gateposts located elsewhere along Constitution Avenue. Designed by Charles Bulfinch for the U.S. Capitol, these features were relocated to 15th Street in the 1870s when the earlier U.S. Capitol fence was removed. Although others were similarly relocated along street corridors elsewhere in the District, the three gateposts located at the intersection of 15th Street and Constitution Avenue, along with the gatepost at the intersection of 7th Street and Constitution Avenue, are the last surviving examples of this effort.

Consideration of the National Register eligibility of the Washington Monument Grounds as part of this CLR suggests concurrence with all of the areas, aspects, and periods of significance suggested by these existing National Register nominations. Research and analysis to prepare the CLR has suggested additional areas, criteria, and periods of significance for consideration in association with the monument's significance and any future updated National Register nomination that might be prepared for the Washington Monument Grounds. For example, the monument grounds is likely significant under Criterion A within the areas of Politics/Government, Social History, Recreation, and Commemoration. The monument grounds have long served the nation as a highly accessible open space set within a context of iconographic features representing American democracy. The Washington Monument Grounds are a popular public gathering place and part of a national meeting ground for expressing American rights and freedoms, with the monument serving as a symbolic backdrop. Because this use is on-going, consideration might be paid to extending the period of significance of the property. The monument grounds have also played an important and long-standing role in providing passive and active recreational opportunities for D.C.-area residents and visitors alike, and may be found significant in the area of Recreation.

SIGNIFICANCE EVALUATION CONSIDERATIONS

DESIGN AND CONSTRUCTION OF THE WASHINGTON MONUMENT AND KNOLL

As noted above, the Washington Monument is already listed in the National Register of Historic Places under Criterion C for its significant architecture, engineering, and landscape architecture. It is also a National Historic Civil Engineering Landmark. When completed, the monument was the tallest structure in the world; today it remains the tallest freestanding stone masonry structure. The 1994 HABS documentation of the monument states,

> Built to commemorate the first president of the United States, the monument has also become a hallowed symbol of the nation's government and the city in which it is located. Though the eminent nineteenth-century American architect Robert Mills conceived the initial design, the structure also reflects the technical

> knowledge and aesthetic judgment of Thomas Lincoln Casey, the Army Corps engineer charged with completing the project. Under Casey, a stagnant construction campaign emblematic of mid-nineteenth century political and economic turmoil at long last produced the tallest building of its day and an enduring American icon.[2]

The Washington Monument also appears to possess significance as an important example of Egyptian Revival architecture and as a feat of structural engineering that remains the tallest freestanding stone masonry structure in the world. It is significant as the work of Robert Mills, notable 19th-century American architect, whose 1836 design for an obelisk surrounded by a circular pantheon formed the basis of the first phase of construction. It is also significant as the work of Lt. Col. Thomas Lincoln Casey, who as engineer in charge of completing the monument resolved the engineering problems of the initial design related to the inadequate foundations, designed the innovative interior structure of phoenix columns, and redesigned the monument in accordance with the proportions of true Egyptian obelisks. His work led to the completion of the world's tallest structure at the time. The construction period for the Washington Monument extends from 1848 through the initial completion of the knoll in 1889.

The 1902 McMillan Commission Report also describes the architectural significance of the monument and its role within the urban setting of the nation's capital:

> Taken by itself, the Washington Monument stands not only as one of the most stupendous works of man, but also as one of the most beautiful of human creations. Indeed, it is at once so great and so simple that it seems to be almost a work of nature. Dominating the entire District of Columbia, it has taken its place with the U.S. Capitol and the White House as one of the three foremost national structures.[3]

Preliminary investigations have not suggested significance for associations with important persons, aside from the architects, engineers, and landscape architects involved in the design and construction of the monument and grounds. As such, these associations are considered as part of the design significance of the property. Inclusion of Criterion B significance in the Washington Monument National Register is thus not recommended at this time.

MONUMENT LODGE

The Monument Lodge, located approximately 480 feet east of the Washington Monument on the monument grounds, is included in the 1980 National Register documentation as a contributing structure. Built in 1888-89, the Monument Lodge embodies the distinctive characteristics of a Victorian adaptation of the Greek temple form. It is part of the ensemble of structures directly related to the Washington Monument itself. The Monument Lodge is considered in more detail in the Historic Structures Report (HSR) that is a companion document to this CLR.[4]

SURVEY LODGE

The Survey Lodge, located approximately 750 feet southwest of the Washington Monument, is included in the 1980 National Register documentation for the Washington Monument as a contributing structure. Constructed between 1886 and 1901, the Survey Lodge survives as an example of an aesthetically designed mechanical building. It is part of the ensemble of structures directly related to the Washington Monument itself. The Survey Lodge is considered in more detail in the HSR that is a companion document to this CLR.

L'ENFANT PLAN FOR THE CITY OF WASHINGTON, D.C.

The L'Enfant Plan for the city of Washington, including the Washington Monument Grounds, is listed on the National Register of Historic Places. The 1994 nomination for the plan indicates that it is significant under Criteria A, B, and C, in the areas of Community Planning and Development, Landscape Architecture, Politics/Government, and Transportation, during the period 1791-1943. The nomination also assigns significance to the Washington Monument Grounds as an integral component of the larger National Mall property. The evaluation of the significance of the Washington Monument Grounds conducted as part of this CLR corresponds with the findings of the L'Enfant Plan National Register nomination with one exception. Transportation has not been considered as part of this study.

The Washington Monument stands as a sentinel and the central focus of L'Enfant's conceived Monumental Core. Despite almost universal support for L'Enfant's vision, it took many years for elements of the plan to be effected. The site of the Washington Monument, for example, has witnessed tremendous change since the 18th century. Much of the land currently included within the grounds was created from the filling of Potomac River tidal flats. The McMillan Plan, overseen by the Commission of Fine Arts (CFA) during the early 20th century, helped bring L'Enfant's plan to fruition. Through their work in the vicinity of the Washington Monument, the CFA was able to strengthen and improve the National Mall area as the centerpiece of the nation's capital. Despite the overall success of the McMillan Plan, the formal gardens proposed by the CFA for the Washington Monument Grounds were never built.

Implementation of the McMillan Plan was facilitated by notable landscape architect Frederick Law Olmsted, Jr., who became consulting landscape architect for the grounds of the Washington Monument and West Potomac Park in 1930. In this role, Olmsted built on his experience as a member of the McMillan Commission and the CFA:

> as a member of the Commission of Fine Arts (1910-1918) he helped approve the design for the Lincoln Memorial by architect Henry Bacon, the statue by Daniel Chester French, and the design for the nearby Reflecting Pool…. When Olmsted decided to retire from the Commission of Fine Arts in 1918, after two four-year terms, President Woodrow Wilson wrote to him '...you were instrumental in the reinstatement of the L'Enfant plan for the City of Washington.'[5]

Consideration should be paid to the association of the Washington Monument Grounds to the L'Enfant Plan and inclusion of associated significance criterion in a future National Register nomination update. The landscape features of the Washington Monument Grounds that contribute to the significance of the L'Enfant Plan include the monument, knoll, ceremonial ring of flagpoles around the monument, open lawn areas, perimeter streets and sidewalks, long axial views, and street tree plantings.

ADDITIONAL ISSUES OF SIGNIFICANCE

USE OF THE WASHINGTON MONUMENT GROUNDS AS A PUBLIC GATHERING SPACE

The Washington Monument Grounds are also potentially significant under Criterion A of the National Register in the areas of Politics/Government, Social History, and Commemoration as a public gathering place, and as a ceremonial site for public assembly imbued with national symbolic value. Since well before its completion, the Washington Monument has served as a symbol of the nation, of unification, and of the rights and values espoused in America's governmental system and ideals. The symbolism of the monument, erected to honor the nation's first president and one of its founding fathers, and its pivotal location as the linchpin of the National Mall area's cross axes have influenced its evolving role as a national focal point for expressing opinion, debating the role of government, celebrating joy, and mourning tragedy. As expressed previously by Carol B. Thompson, former District of Columbia State Historic Preservation Officer,

> The Washington Monument is of transcendent importance in American history and culture. The monument grounds are an integral visual part of the monument. The powerful monolith is brilliantly set off by an expansive, unobstructed grassy knoll which complements the scale of the monument, its location within the National Mall area, and the symbolism of the monument as a national meeting ground.[6]

President Andrew Johnson, president ex-officio of the Washington National Monument Society, offered in 1866, "Let us restore the Union, and let us proceed with the monument as its symbol until it shall contain the pledge of all the States of the Union," the site since has served a wide array of functions relating to its symbolic role as a national public gathering place, including inaugurations, rallies, parades, protests, presidential addresses, performances, and celebrations, such as the annual 4th of July event.[7] Various features located on the monument grounds support this significance. These include the monument, open grassy knoll, ring of flags and circular plaza at the monument's base, the ornamental groves of cherry trees and lines of street trees that imbue a quality of ceremony and celebration and that frame important views, views to the surrounding monuments and governmental buildings, and the Sylvan Theatre, which has served as a dais for presentations.

The National Register nomination for the L'Enfant Plan for the City of Washington notes the following relating to the role of the Monumental Core as a national gathering place:

> The federal government has sanctioned processions along the city's streets and avenues for inaugurations, funerals, and military victories since the early 1800s. While patriotic supporters of the war effort flocked to the city during World War II, the Vietnam conflict attracted protesters who found in Washington's streets and public parks a perfect public forum for demonstrating dissenting views. Although dissidents have historically used the federal property to gain official notice, citizens of the television age realized that visibility on federal property in the national capital could help spread their messages around the nation and the world. Lafayette Square, Dupont Circle, and the Mall were used frequently by anti-war and civil-rights demonstrators in the 1960s...The Washington Monument, U.S. Capitol, and White House still commonly serve as backdrops for parades, protests, and rallies and the National Park Service grants the permits...While special-interest groups congregate in Washington's open spaces to assert their First Amendment rights, thousands of tourists from the United States and abroad seek the culture and history concentrated in this small urban core. L'Enfant planned a city that would merit international regard, and throughout the city's first century the Army Corps of Engineers struggled with meager funds to create a city that would serve as an example to the rest of the nation and world. Although Washington lost to Chicago the right to hold the World's Columbian Exposition (1893) on the land recently reclaimed from the Potomac River, the stretch of land between the U.S. Capitol and the Lincoln Memorial has become a monument to American achievement as well as the City Beautiful Movement.[8]

RECREATION

The Washington Monument Grounds, alone and as part of the larger National Mall area, has served as a significant recreational area for local residents and visitors since the late 19th century. Over the years, recreational features located on the grounds have ranged from bathing or swimming pools, to baseball and soccer fields and tennis courts. The monument grounds have long afforded opportunities for more passive recreational uses, particularly strolling and picnicking. Today, the site continues to be a popular location for recreational activities, particularly on the broad open expanses of grassy lawn that characterize the monument grounds. The Washington Monument Grounds appear to possess National Register significance in the area of recreation due to their role as parkland as noted by Scott Shultz, "The Washington Monument and West Potomac Park are essential in the recreation and life of the Nation's Capital."[9]

The features that contribute to this area of significance include the open grass lawn areas and the relatively level topography surrounding the monument and knoll.

INFORMATION POTENTIAL

The informational potential of the site has also been considered as part of this study. Because the Washington Monument Grounds are in great part covered with fill, there is limited potential for both prehistoric and historic archeological resources. Any prehistoric archeological resources will be found below the stratum of fill that sits on top of the circa 1878 grade. The knoll on which the monument sits consists completely of fill deposits, the first used to cover the tiered foundation of the monument and later layers placed to expand the diameter of the plaza at the top of the mound. If prehistoric activity occurred on or near the monument's current location, any evidence has surely been disturbed. However, the Environmental Assessment for the site (2000) refers to the Washington Monument Grounds as a prehistoric site from the Late Archaic period, 3,500-1,200 B.C.[10]

The site is potentially sensitive for historic resources relating to the circulation system and landscape design. The laying out of pathways and flowerbeds on the grounds during the first half of the 20th century is mentioned in documents, but specific locations are not given for many of these features. If evidence of these features has not been disturbed, archeology could supply a record of changes in site organization and use that is otherwise unavailable. The mound itself has apparently been re-graded many times, but a stratigraphic record of the process involved in creating the mound as it exists today may remain, illustrating how the ground plane has changed over time.

INTEGRITY ASSESSMENT

Assessment of a landscape's integrity is based on an evaluation of the existence and condition of physical features dating from a property's period of significance, taking into consideration the degree to which the individual qualities of integrity are present. The seven qualities of integrity assessed in accordance with National Register criteria are location, design, setting, materials, workmanship, feeling, and association. As defined in National Register Bulletin 15: *How to Apply the National Register Criteria for Evaluation*:

> **Location** is the place where the historic property was constructed or the place where the historic event occurred; **design** is the combination of elements that create the form, plan, space, structure, and style of a property; **setting** is the physical environment of a historic property; **materials** are the physical elements that were combined or deposited during a particular period of time and in a particular pattern or configuration to form a historic property; **workmanship** is the physical evidence of the crafts of a particular culture or people during any given period in history or prehistory; **feeling** is a property's expression of the aesthetic or historic sense of a particular period of time; and **association** is the direct link between an important historic event or person and a historic property.[11]

National Register Bulletin 15 also states that:

> Integrity is the ability of a property to convey its significance….Historic properties either retain integrity (that is, convey their significance) or they do not. Within the concept of integrity, the National Register Criteria recognize seven aspects or qualities that, in various combinations, define integrity. To retain historic integrity a property will always possess several, and usually most, of the aspects. The retention of specific aspects of integrity is paramount for a property to convey significance. Determining *which* of these aspects are most important to a particular property requires knowing why, where, and when the property is significant.[12]

Based upon the comparative analysis of historic and existing landscape conditions conducted on behalf of this CLR, the Washington Monument Grounds possesses sufficient integrity to convey the important associations of its period of significance to the visitor. Although the site has changed since 1943, the end-date of the period of significance, notably through changes in circulation and vegetation features and patterns, the addition of the German-American Friendship Garden, and permanent flagpoles and security features around the base of the monument, many features survive from the period of significance. Chief among them are the obelisk, the paved plaza at its base, the elevated mound or knoll beneath the monument, the open, grassy lawn surrounding the mound, and the Monument and Survey Lodges. Ongoing use of the monument grounds for commemorative activities also supports site integrity.

The Washington Monument Grounds possess integrity of location as the original site of the proposed and constructed monument, which has existed relatively unchanged since its completion in 1884. The site also possesses integrity of location as the public park identified in the L'Enfant Plan as Reservation No. 2.

The Washington Monument Grounds also possesses integrity of setting due to the ongoing connection of the site to the Monumental Core of the city of Washington, D.C., and its associated greenswards linking the monument grounds with anchors of the McMillan Plan's cross-axial design, including the U.S. Capitol, the White House, the Lincoln Memorial, and the Jefferson Memorial. There have been few alterations of consequence to these surrounding conditions to diminish the integrity of the setting of the monument grounds.

The site also possesses integrity of feeling and association for the period of significance due to the presence of many historic elements composed on the site by 1943. The informally arranged walks and the broad expanses of open grassy lawn, coupled with the overlay of the formal cross-axes of the McMillan Plan, at once recall the early picturesque character of the Downingesque Mall and the more ceremonial qualities established during the 20th century.

Integrity of materials, design, and workmanship has been diminished to a degree by changes to circulation routes and systems, security improvements in the form of the Jersey barriers, and site furnishings. However, the site retains integrity of these aspects when taking into consideration

the monument, Monument Lodge, Survey Lodge, Sylvan Theater, Jefferson Pier, mound, grassy open lawns, and perimeter tree groves and street tree plantings.

ENDNOTES

[1] Donald C. Phanz, "Washington Monument," in *National Register Nomination* (Washington: National Park Service, 1980), item 8, page 1.
[2] Aaron V. Wunsch, *Washington Monument,* No. DC-428 (Washington: National Park Service, Historic American Buildings Survey, 1994), 2.
[3] John W. Reps, *Monumental Washington* (Princeton, NJ: Princeton University Press, 1967), 120-121.
[4] The Monument Lodge was essentially finished in 1889, although interior alterations and renovations were undertaken over the next few decades. See John Milner Associates, Inc. *Historic Structure Report: Washington Monument and Associated Structures. Volume II—Monument Lodge* (Washington: National Park Service, 2004), 2.2, 2.4.
[5] Scott G. Shultz, "A General History of West Potomac Park and Washington Monument Grounds Cultural Landscapes" (Washington: National Park Service, National Capital Parks – Central), 1995.
[6] Carol B. Thompson, State Historic Preservation Officer for the District of Columbia, to Robert Stanton, Regional Director, National Capital Region, National Park Service, 12 May 1986.
[7] Louis Torres, *"To the Immortal Name and Memory of George Washington;" The US Army Corps of Engineers and the Construction of the Washington Monument* (Washington: Government Printing Office, 1989), 30.
[8] Sara Amy Leach and Elizabeth Bartold, "L'Enfant Plan of the City of Washington, District of Columbia," National Register nomination. (Washington: National Park Service, 20 July 1994), 8-44.
[9] Shultz, "General History of West Potomac Park," 22.
[10] Additional information regarding the results of these archaeological projects is developed in the Executive Summary of this report.
[11] National Park Service, National Register Bulletin 15: *How to Apply the National Register Criteria for Evaluation* (Washington: Department of the Interior, 1995), 44.
[12] Ibid., 44-45.

Chapter Six

Management Philosophy

CHAPTER SIX

MANAGEMENT PHILOSOPHY

INTRODUCTION

Management zones are sub-areas of a site that encompass cultural landscape character areas with similar levels of significance and integrity. Management zones are used to establish a framework or approach for treatment. Character areas that retain a higher degree of integrity are highly sensitive to change. Stabilization and preservation is the most appropriate treatment approach for character areas that retain higher degrees of integrity. Those areas that have already experienced a diminishment of integrity are better candidates for rehabilitation, and the incorporation of necessary new uses or features.

CHARACTER AREAS

Character areas are landscape places and spaces that share similar characteristics or are unified by land use, topography, vegetative character, historic associations, or combinations thereof. As part of the development of the 2002 Development Concept Plan (DCP) for the Washington Monument Grounds security improvements, five distinct character areas were identified and described as comprising the cultural landscape composition of the site. The following is derived from the DCP character area assessment.

1. The Axis

These two areas are the sacred spaces that cannot be intruded upon by tall vertical elements, including trees. The first is the east-west axis which terminates at the U.S. Capitol and the Lincoln Memorial. These, of course, are reciprocal views of vast scale that can absorb some temporary or permanent ground level features without being disrupted. A good example of this is the Monument Lodge. Due to its size and the low topography upon which it is built, it is not intrusive on the axis.

The second axis, 16th Street from the White House to the Jefferson Memorial, is more subtle and intimate. It is a narrower and more focused view that is to be protected here, but by its nature cannot be intruded upon except at the ground plane. The intrusion of trees would be unacceptable and the framing trees must be pruned to assure the vista is protected. The removal of the 16th Street parking lot, as part of this plan, will be a vast improvement. Care must be taken in the design of the completion of the German-American Friendship Garden to ensure that it

does not interrupt the main vista between the White House and the Jefferson Memorial. The Jefferson Pier is at the center of this axis and will remain undisturbed by the regarding of the grounds or construction of the walkways.

2. The Plaza

This circular plaza ringed by 50 American flags is the simple platform upon which the shaft of the obelisk rests. Its simple form and lack of embellishment assures that the monument dominates this landscape. The existing diameter is the historic edge of the circular roadway which encircled the monument from 1889 to 1961. There were no elaborate paving patterns in the circular plaza area and any proposed paving pattern must be simply but elegantly designed to respect the dominance of the obelisk in the landscape. One major intrusion on this area is the four light vaults that house the lamps that illuminate the midsection of the monument. These will be replaced and relocated to the four corners at grade where they will not intrude on the north-south and east-west vistas. The temporary visitor security screening facility is the second major intrusion on the plaza and will thankfully be demolished by this project. Anything placed on the plaza, such as signage, benches, light vaults, or other furniture, must be carefully designed so as not to disrupt this sacred space. The 50 flags provide a delicate frame to the space that is human in scale and creates a sense of patriotism especially when they are stirred by the wind and shadowed on the monument. As evidenced by the temporary facility now in place and the unbuilt original design by Robert Mills of a colonnade around the base of the obelisk, architecture in this area is visually intrusive and compromises the significant simplicity and elegance of this composition.

3. The Mound

This area extends out from the monument 400 feet and encompasses the fill that was placed on the existing grade to mound up to the finished grade of the plaza surrounding the monument. This is the gently rising topographic feature that provides the all-important greensward setting for the monument itself. No trees or other vertical elements are appropriate here. Only horizontal elements such as walkways that respect the slope can be placed within this space. The Monument Lodge and the proposed vehicular barrier walls are located at the transition between the mound and the flatter topography beyond. The proposed skylight for the underground facility will be oriented on the east-west axis and flush with the topography of the mound.

4. The Flats

This area is the flat topography that surrounds the mound and provides a place for recreational activities and temporary festivals. Eight softball fields and areas for informal recreation have been traditional uses here. The only trees that exist are clusters of cherry trees on the north planted in the 1960s. The concept was that

they would appear as pink clouds when in bloom as seen from the top of the monument. They are in stressed condition because of the inherent compacted soil. No other trees or shrubs should be planted in sectors of the flats where they would interfere with recreational uses.

5. Sylvan Edge

The grounds have historically been surrounded with canopy shade trees except on the two cross axes. This vegetative frame defines the edges of the spaces as seen from the monument and provides a shade filtered and framed view of the monument as seen from surrounding streets and sidewalks through the canopy of the high branched trees with grass beneath. This frame will be enhanced with additional trees and maintained as a critical element in the overall composition of the landscape. In the southeast corner on the west side of 15th Street, the sylvan edge is denser and contains a copse of cherry trees planted in 1955 where 15th Street rises to meet Independence Avenue. This area also contains the Sylvan Theatre structure and the Survey Lodge, which are visually enshrouded by the trees. The seating area for the theater is on the grassy mound, as the slope rises away from the stage. From a visual standpoint these structures are situated so as not to intrude on the axis and mound areas of the Washington Monument Grounds. A realigned 15th Street runs north-south through the sylvan edge as well as the east-west axis. Its recent reconstruction, based on the 1993 Development Concept Plan, introduced a road geometry that is symmetrical to the monument and frames the mound upon which it rests. The small food and souvenir kiosks proposed on Madison and Jefferson Drives have been carefully located in the sylvan edge so as not to visually intrude on the axis or the flats.[1]

IDENTIFICATION OF MANAGEMENT ZONES

Three management zones have been identified for the Washington Monument Grounds. These zones are based upon the analysis of landscape characteristics included in Chapter Four, and the significance and integrity evaluations summarized in Chapter Five of this CLR. Each of the character areas identified above is included within one of the four management zones described below.

Zone I Areas that retain a high degree of integrity for the period of significance. The design intent is fully intact, and the area remains relatively similar in character to the end date of the period of significance. *An appropriate landscape treatment approach for this zone is preservation, including protection, maintenance, and repair.*

Character areas that should be considered for this approach include the Axis and the Mound.

Zone II Areas with a diminished integrity relating to the period of significance due to the subsequent addition or modification of features. The original design intent is evident, but has been obscured by later additions and changes in material. Spatial organization has been affected by these changes. The accommodation of new uses and visitor accessibility and safety improvements may be necessary in these areas due to their public value. *Rehabilitation is the most appropriate landscape treatment approach for this zone due to the need to accommodate public access and security.*

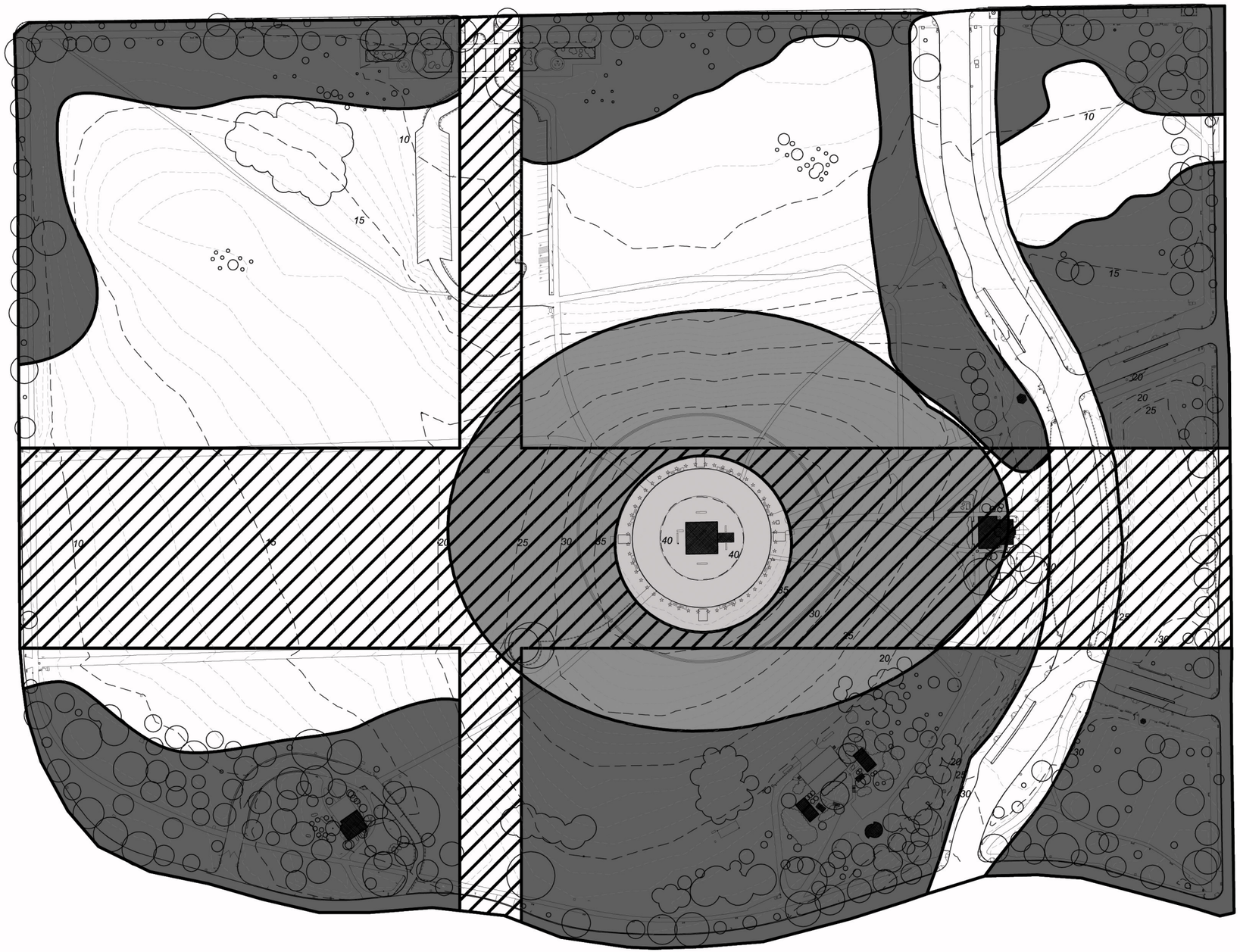
The character area that should be considered for this approach is the Plaza.

Zone III Areas with diminished integrity relating to the period of significance due to the loss of features integral to the site during the period of significance. Although the character and design of the area during the period of significance has been heavily modified, the area's current configuration more appropriately expresses the original and ongoing design intent for the character of the Washington Monument Grounds—and the general character of the Monumental Core—than that which was present during the period of significance. *An appropriate landscape treatment approach for this zone is preservation, although rehabilitation is also appropriate to the extent that modifications do no interfere with current recreational and gathering uses.*

Character areas that should be considered for this approach include the Flats and the Sylvan areas.

ENDNOTES

[1] National Park Service, "Washington Monument Development Concept Plan," rev. 3 April 2002, provided to JMA by NPS via email, 16 January 2003.



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NPS Drawing No. 84492

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Map 6-1

Management Zones

Washington Monument Grounds
Cultural Landscape Report
Washington, DC - National Park Service

Bibliography

BIBLIOGRAPHY

PRIMARY SOURCES

NEWSPAPERS AND POPULAR MEDIA

Country Life
The Daily National Intelligencer
The Evening Star
Frank Leslie's Illustrated Newspaper
The New York Times
The Times-Herald
The Washington Post
The Washington Star
The Washington Times
The Washington Times and Post Herald

ARCHIVES

National Archives and Records Administration (College Park, MD)

"Concession Stand, Monument Grounds." 7 August 1947. Drawing 74.20-38-1, NARA RG 79, Cartographic and Architectural Records LICON, Special Media Archive Division, National Archives and Records Administration, College Park, MD.

National Archives and Records Administration (Washington)

Records of the Office of Public Buildings and Public Parks of the National Capital, 1900-1935 (Record Group 42)

Bickworth, Lt. to Washington National Monument Society, 7 May 1861. Entry 436, Records Relating to the Design and Construction of the Monument, Monument Grounds, and Offices of the Society.

Casey, Col. Thomas Lincoln. "Advertisement and Specifications for Boiler House at the Washington Monument." 3 October 1885. Box 2, entry 512, Contracts and Records of the Engineer in Charge, 1876-1892; Records of the Joint Commission for the Completion of the Washington Monument, 1876-1892.

"Inventory of Property Belonging to the W. N. Monument Society." 20 March 1855. Entry 432, Correspondence.

"Journal of Meeting of Board of Managers of Washington National Monument Society." 29 August 1848, 236. Entry 418, Proceedings of the Society, 1833-1951.

"Journal of Meeting of Board of Managers of Washington National Monument Society." 3 October 1848, 240. Entry 418, Proceedings of the Society, 1833-1951.

Mills, Robert. "To the Board of Managers of Washington National Monument Society." 1 November 1848. Entry 418, Proceedings of the Society, 1833-1951.

Mount, John F. to Col. O. H. Ernst, Engineer in Charge of the Washington Monument, Report relating to the Washington Monument for the month of December 1889," 2 January 1890. 135. Box 1, entry 529; Copies of Letters Sent by the Custodian of the Monument, Records of the Engineer in Charge of the Monument, 1879-1929.

Office of the Public Buildings and Public Parks of the National Capital. *Annual Report of the Supervisor of Recreation for the Year 1925*. Entry 302, Records of the Director, 1900-1933.

Thomas, G. M. to Col. John M. Wilson, "Report of Operations upon the Washington Monument for the month of January, 1889." 31 January 1889. Entry 529, Copies of Letters Sent by the Custodian of the Monument, Records of the Engineer in Charge of the Monument, 1879-1929.

United States Department of the Interior, National Park Service, Eastern Division, Branch of Washington. "Untitled." 21 January 1935. Box 1, Entry 432, Correspondence.

Society for the Preservation of New England Antiquities (Boston)

Green, Bernard R. "Notes on Project for a Marble Pyramidion for the Washington Monument, represented in four sheets of drawings on file in the Engineer Office," 4 August 1884, box 41, folder 21, Casey Family Papers.

NPS-NCR Collection and NPS Internal Correspondence (Washington)

"Aluminum Awning, Sink & Lav., Concession Stand, Washington Monument Lodge." 25 November 1952, Drawing 807_80067; NPS-NCR Collection.

"Approach Plan." 20 July 1943. Drawing #807_84215a, NPS-NCR Collection.

"Approach Plan, Tentative." 12 July 1943. Drawings #807_84215, NPS-NCR Collection.

Brown, J. Carter to Manus J. Fish. 30 September 1981. NPS-NCR Collection.

Burcham, Lisa (District of Columbia Historic Preservation Officer) to Joseph Lawler (Regional Director, National Capital Region, National Park Service), 21 May 2003 (unarchived internal correspondence).

Burlow, E. K., Administrative Assistant and Budget Officer to Arno B. Camerer, director, NPS. 15 January 1936. NPS-NCR Collection.

"Cherry Tree Planting, Sylvan Theatre, Monument Grounds." 7 June 1954. Drawing 807_84272A, NPS-NCR Collection.

John Milner Associates, Inc. *Historic Structure Report: Washington Monument and Associated Structures. Volume II—Monument Lodge*. Washington: National Park Service, 2004.

_____. *Historic Structure Report: Washington Monument and Associated Structures. Volume III—Survey Lodge*. Washington: National Park Service, 2004.

"Kiosk locations, H Street – N of Washington Monument Lodge." 17 March 1966. Drawing 807_84374; NPS-NCR Collection.

Lawler, Joseph (Regional Director, National Capital Region, National Park Service) to Lisa Burcham (District of Columbia Historic Preservation Officer), 20 May 2003 (unarchived internal correspondence).

Lorenzetti, Steve, et. al, "DRAFT: Cultural Landscape Report: Washington Monument Grounds." March, 2008.

McConnell, Thomas M., Assistant Chief, Division of Contracting, DOI, NPS, NCR to Roger Gosalia, Vice President, MTI Construction Co., Inc. 27 June 1988. NPS-NCR Collection.

Mayfield, G.T. to Mr. Gartside. Memorandum. 12 July 1937. NPS-NCR Collection.

"Monument Lodge Planting Plan." 9 October 1931. Drawing #807_84077, NPS-NCR Collection.

Park, Sharon C. Park (FIFA Chief of Architectural History and Historic Preservation), to Martha Catlin (Advisory Council on Historic Preservation). 7 June 2007. NPS-NCR Collection.

Regional Historian, NPS-NCR, to Superintendent, NCP-Central. 16 January 1992. NPS-NCR Collection.

Root, Irving C., Supervisor, to W. E. Reynolds, Commissioner Public Buildings Administration. 28 April 1942. NPS-NCR Collection.

Root, Irving C., Supervisor, NCR, to W. E. Reynolds, Commissioner, Public Buildings Administration. 22 February 1945. NPS-NCR Collection.

"Sketch of Monument Grounds." (NCP 807_84003, File 44-3). NPS-NCR Collection.

Skidmore, Owings and Merrill, "Preliminary Cherry Tree Planting Scheme 2." 26 October 1966. Drawing 807_84368B, NPS-NCR Collection.

Stanton, Robert, Acting Regional Director, National Capital Region, to Carol B. Thompson, State Historic Preservation Officer, Department of Consumer and Regulatory Affairs. 37 July 1986. NPS-NCR Collection.

Talken-Spaulding, Jennifer. "Revision and Completion of Washington Monument Cultural Landscape Report," 2 November 2007, located at O:\ResMgt\Cultural\CLI\WAMO draft CLR (accessed 9 June 2011)

"Temp. Fed. Office Bldgs T3, T4, & T5." 3 March 1942. Drawing #807_84200A, NPS–NCR Collection.

Thompson, Carol B., State Historic Preservation Officer for the District of Columbia, to Robert Stanton, Regional Director, National Capital Region, National Register Site, 12 May 1986.

Thompson, Harry T., National Capital Parks, NPS, to Superintendent, NCP, NPS. Memorandum. 9 October 1942. NPS-NCR Collection.

Wick, Charles Z. United States Information Agency, to Donald P. Hodel, Secretary of the Interior. 17 April 1984. NPS-NCR Collection.

GOVERNMENT DOCUMENTS AND PUBLISHED PRIMARY SOURCES

Bingham, Col. Theo. A. *Annual Report upon the Improvement and Care of Public Buildings and Grounds and Care and Maintenance of the Washington Monument, in the District of Columbia, Appendix DDD of the Annual Report of the Chief of Engineers.* Washington: Government Printing Office, 1902.

Bromwell, Charles S. *Annual Report upon the Improvement and Care of Public Buildings and Grounds and Care and Maintenance of the Washington Monument, in the District of Columbia, Appendix DDD of the Annual Report of the Chief of Engineers.* Washington: Government Printing Office, 1905.

_____. *Report upon the Improvement and Care of Public Buildings and Grounds and Care and Maintenance of the Washington Monument, in the District of Columbia, Appendix HHH of the Annual Report of the Chief of Engineers.* Washington: Government Printing Office, 1906.

_____. *Report upon the Improvement and Care of Public Buildings and Grounds and Care and Maintenance of the Washington Monument, in the District of Columbia, Appendix GGG of the Annual Report of the Chief of Engineers.* Washington: Government Printing Office, 1907.

Cosby, Col. Spencer. *Report upon the Improvement and Care of Public Buildings and Grounds and Care and Maintenance of the Washington Monument, and the Highway Bridge*

Across the Potomac River, Washington, District of Columbia, Appendix EEE of the Annual Report of the Chief of Engineers. Washington: Government Printing Office, 1908.

_____. *Report upon the Improvement and Care of Public Buildings and Grounds and Care and Maintenance of the Washington Monument, and the Highway Bridge Across the Potomac River, Washington, District of Columbia, Appendix FFF of the Annual Report of the Chief of Engineers.* Washington: Government Printing Office, 1910.

_____. *Report upon the Improvement and Care of Public Buildings and Grounds and Care and Maintenance of the Washington Monument, and the Highway Bridge Across the Potomac River, Washington, District of Columbia, Appendix EEE of the Annual Report of the Chief of Engineers.* Washington: Government Printing Office, 1911.

_____. *Report upon the Improvement and Care of Public Buildings and Grounds and Care and Maintenance of the Washington Monument, and the Highway Bridge Across the Potomac River, and Upon Erection of Monuments, Memorials, etc., Washington, District of Columbia, Appendix EEE of the Annual Report of the Chief of Engineers.* Washington: Government Printing Office, 1912.

Ernst, Col. Oswald H. *Annual Report Upon the Improvement and Care of Public Buildings and Grounds and Care and Completion of the Washington Monument, in the District of Columbia, Appendix EEE of the Annual Report of the Chief of Engineers for 1891.* Washington: Government Printing Office, 1891.

_____. *Annual Report Upon the Improvement and Care of Public Buildings and Grounds and Care and Completion of the Washington Monument, in the District of Columbia, Appendix BBB of the Annual Report of the Chief of Engineers for 1892.* Washington: Government Printing Office, 1892.

"Flagpole Arrangement, Washington Monument." 8 January 1957. Drawing #807_84279; NPS-NCR Collection.

Grant, U. S., III. *General Orders 1925-1927, Public Buildings and Public Parks.* Unpublished correspondence.

"Improvement of the Washington Monument Grounds," H.R. Doc. 72-528 (1934).

Joint Commission for the Completion of the Washington Monument, Annual Report, H.R. Doc. 45-7 (1878).

_____. Annual Report, H.R. Doc. 45-7.2 (1879).

_____. Annual Report, H.R. Doc. 46-9 (1880).

_____. Annual Report, H.R. Doc. 47-19 (1881).

_____. Annual Report, H.R. Doc. 48-8 (1884).

_____. Annual Report, H.R. Doc. 49-6 (1885).

_____. Annual Report, H.R. Doc. 49-57 (1887).

National Capital Planning Commission. "Commission Action: Washington Monument Grounds, Revised Development Concept Plan and Preliminary Site and Building Plans for Visitor and Security Improvements." 9 January 2003.

Select Committee on Washington National Monument. H. Rep. 43-485 (1874).

Symons, Col. Thomas W. and Col. Theo. A. Bingham. *Annual Report upon the Improvement and Care of Public Buildings and Grounds and Care and Maintenance of the Washington Monument, in the District of Columbia, Appendix EEE of the Annual Report of the Chief of Engineers.* Washington: Government Printing Office, 1903.

Symons, Major Thomas W. and Captain Charles S. Bromwell. *Annual Report upon the Improvement and Care of Public Buildings and Grounds and Care and Maintenance of the Washington Monument, in the District of Columbia, Appendix DDD of the Annual Report of the Chief of Engineers.* Washington: Government Printing Office, 1904.

United States Army Corps of Engineers. *Annual Report to the Chief of Engineers, U. S. Army.* Washington: Government Printing Office, 1871-1887; 1893-1895; 1897; 1901; and 1923.

Wilson, Lt. Col. John M. *Annual Report upon the Improvement and Care of Public Buildings and Grounds in the District of Columbia, Appendix ZZ of the Annual Report of Chief of Engineers for 1888.* Washington: Government Printing Office, 1888.

_____. *Annual Report Upon the Improvement and Care of Public Buildings and Grounds and Care and Completion of the Washington Monument, in the District of Columbia, Appendix AAA of the Annual Report of the Chief of Engineers for 1889.* Washington: Government Printing Office, 1889.

_____ and Col. Oswald H. Ernst. *Annual Report Upon the Improvement and Care of Public Buildings and Grounds and Care and Completion of the Washington Monument, in the District of Columbia, Appendix BBB of the Annual Report of the Chief of Engineers for 1890.* Washington: Government Printing Office, 1890.

SECONDARY SOURCES

NATIONAL PARK SERVICE PUBLICATIONS AND REPORTS

Barthold, Elizabeth J. *L'Enfant-McMillan Plan of Washington, D.C. – HABS No. DC-668*. Sara Amy Leach, ed. Washington: National Park Service, Historic American Buildings Survey, 1993.

_____. *The National Mall and Monument Grounds (Reservation Numbers 2, 3, 3A, 3B, 4, 5, 6, 6A*); *HABS No. DC-687*. Washington: National Park Service, Historic American Buildings Survey, 1993.

Dillon, Helen. "U.S. Capitol Gatehouses and Gateposts (Former)." *National Register Nomination*. Washington: National Park Service, 1972.

Hartman-Cox Architects. *Visitor Facility for the Washington Monument, Washington D.C. Comprehensive Design Program and Engineering Feasibility Design Program*. Washington: National Park Service, 1973.

Hoover, Michael D. *Origins and History of the Washington Monument Flag Display.* Unpublished report, 1992.

Leach, Sara Amy and Elizabeth Bartold. *National Register Nomination*: *L'Enfant Plan of the City of Washington, District of Columbia*. Washington: National Park Service, 1994.

Louis Berger Group, Inc., *Draft Report: Phase II Archaeological Investigation for the National Museum of African American History and Culture*. Unpublished report. 2007.

_____. *Final Report: Phase IA Archaeological Investigation for the Potomac Park Levee*. Unpublished report. 2009.

_____ and Robinson & Associates, Inc. *Preliminary Archaeological and Draft Historical Preservation Report*. Unpublished report. 2007.

Mackintosh, Barry. *The National Parks: Shaping the System.* Washington: National Park Service, 2000.

National Park Service. *Development Concept Plan and Alternatives, Washington Monument*. Washington: National Capital Parks–Central, 1981.

_____. *Cultural Landscape Inventory: Constitution Gardens*. Washington: National Park Service, 1998.

_____. *Cultural Landscape Inventory: Washington Monument Grounds and Washington Monument*. Washington: National Park Service, 2009.

_____. *Cultural Landscape Report: West Potomac Park and Lincoln Memorial Grounds*. Washington: National Capital Region, August 1999.

_____. "Decision Notice and finding of No Significant Impact, Washington Monument Permanent Security Improvements Environmental Assessment." Washington: Department of the Interior, 2002.

____. *Development Concept Plan: Washington Monument Grounds (Revisions to the 1981 Development Concept Plan).* Washington: National Park Service, 1989.

_____. *Environmental Impact Assessment, Interim Development Plan for Washington Monument Grounds.* Unpublished report, May 1974.

_____. *National Register Bulletin 15: How to Apply the National Register Criteria for Evaluation*. Washington: Department of the Interior, 1995.

_____. *Outline of Future Plans for Improvements in the Vicinity of the Washington Monument Under the National Park Service MISSION 66 Program.* Washington: Department of the Interior, 1959.

_____. *Washington Monument: Permanent Security Improvements Environmental Assessment,* Washington: Department of the Interior, 2002.

_____. *Process of Implementation for Grounds Improvement and Accessibility, Washington Monument Grounds.* Washington: Department of the Interior, 1993.

_____. *Supplement to the Environmental Assessment for Improvements to the Washington Monument Grounds Covering a Temporary Bicentennial Visitor Orientation Facility.* Washington: Department of the Interior, 1974.

_____. *Washington National Monument – Annual Report.* Unpublished report, 1961.

_____ and NACC. *The NACC Cherry Tree Source Book, Draft.* Unpublished report, June 1996.

Olszewski, George J. *A History of the Mall, Washington, D.C.* Washington: National Park Service, Office of History and Historic Architecture Eastern Service Center, 1970.

_____. *A History of the Washington Monument, 1844–1968.* Washington: National Park Service, Office of History and Historic Architecture Eastern Service Center, 1971.

Phanz, Donald C. "Washington Monument." In *National Register – Documentation of Existing National Register Property*. Washington: National Park Service, 1980.

Shultz, Scott G. *A General History of the West Potomac Park and Washington Monument Grounds Cultural Landscapes.* Washington: National Park Service, 1995.

Skidmore, Owings & Merrill. *The Washington Mall Master Plan 1971*. Washington: National Park Service, 1971.

Wunsch, Aaron V. *Washington Monument, HABS No. DC-428.* Washington: National Park Service, Historic American Buildings Survey, 1994.

OTHER

Barber, Lucy G. *Marching on Washington: the Forging of an American Political Tradition.* Berkeley: University of California Press, 2002.

Bedini, Silvio A. *The Jefferson Stone.* Frederick, MD: Professional Surveyors Publishing Co., 1999.

Berard, Jim. *The Flying Cat and Other Amazing Stories of the Washington Monument.* Delaplane, VA: EPM Publications, 2000.

Freidel, Frank and Lonnelle Aikman. *George Washington: Man and Monument.* Washington: Washington National Monument Association, 1973.

Haney, John S. "Relighting the Washington Monument." *Illuminating Engineering,* August 1958.

Humphrey, Robert L. and Mary Elizabeth Chambers. *Ancient Washington: American Indian Cultures of the Potomac Valley*, 2nd ed. George Washington University: Washington, 1985.

Litoff, Judy Barrett and David C. Smith, *We're In This War Too: World War II Letters from American Women in Uniform*. New York: Oxford University Press, 1994.

National Capital Planning Commission and Frederick Gutheim. *Worthy of the Nation: The History of Planning for the National Capital*. Washington: Smithsonian Institution Press, 1977.

O'Malley, Therese. "'A Public Museum of Trees': Mid-Nineteenth Century Plans for the Mall." In *The Mall in Washington, 1791-1991, Second Edition*, edited by Richard Longstreth. Washington: Center for Advanced Study in the Visual Arts and the National Gallery of Art Publishing Office, 2002.

Provine, Dorothy S., comp. *Preliminary Inventory of the Records of the Government of the District of Columbia, Record Group 351*. Washington: National Archives and Records Administration Service, 1976.

Reps, John W. *Monumental Washington: the Planning and Development of the Capital Center.* Princeton, NJ: Princeton University Press, 1967.

Scott, Pamela. "Robert Mills and American Monuments." In *Robert Mills, Architect*, edited by John M. Bryan. Washington: American Institute of Architects Press, 1989.

_____. "'This Vast Empire': The Iconography of the Mall, 1791-1848." In *The Mall in Washington, 1791-1991, Second Edition*, edited by Richard Longstreth. Washington: Center for Advanced Study in the Visual Arts and the National Gallery of Art Publishing Office, 2002.

Department of Anthropology. *Database Report for Accession Number 32872, Washington Monument*. Smithsonian Institution, National Museum of Natural History. Washington. 6 May 2003.

Torres, Louis. *To the Immortal Name and Memory of George Washington: The United States Corps of Engineers and the Construction of the Washington Monument*. Washington: Government Printing Office, 1984.

United States Census Bureau, "District of Columbia Quick Facts." Last revised 3 June 2011. http://quickfacts.census.gov/qfd/states/11000.html.

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