

Davis Brody Bond

COLT
ARMORY
COLTSVILLE
NATIONAL
HISTORICAL
PARK

SPACE PLANNING + PROGRAMMING STUDY

National Park Service / Coltsville National Historical Park

PMIS: FRST - 236702A

26 October 2018



Contents

1. PROJECT SUMMARY	4
• Project Overview	7
• Programming Process	8
• Project Goals	9
• Project Team & Participants	10

2. SITE ASSESSMENT & CURRENT OPERATIONS	12
• Site Location: Coltsville	14
• COLT NHP Current Operations & Partnerships	16

3. PROGRAM REQUIREMENTS & ANALYSIS	20
• Data Collection & Analysis	22
• Program Requirements	24
• Parking	28

4. COLSTVILLE ARMORY	30
• Colt Armory Buildings 8 & 10	
(a) History & Physical Evolution	32
(b) Existing Conditions	34

5. BUILDINGS 8 & 10 ADAPTIVE RE-USE	40
• Program Allocation	42
• Coltsville NHP Planning Principles	44
• Short-Term Development (Option A)	46
• Interim Development (Option B)	48
• Long-Term Development (Option C)	52

6. VALUE-BASED DECISION SESSION	54
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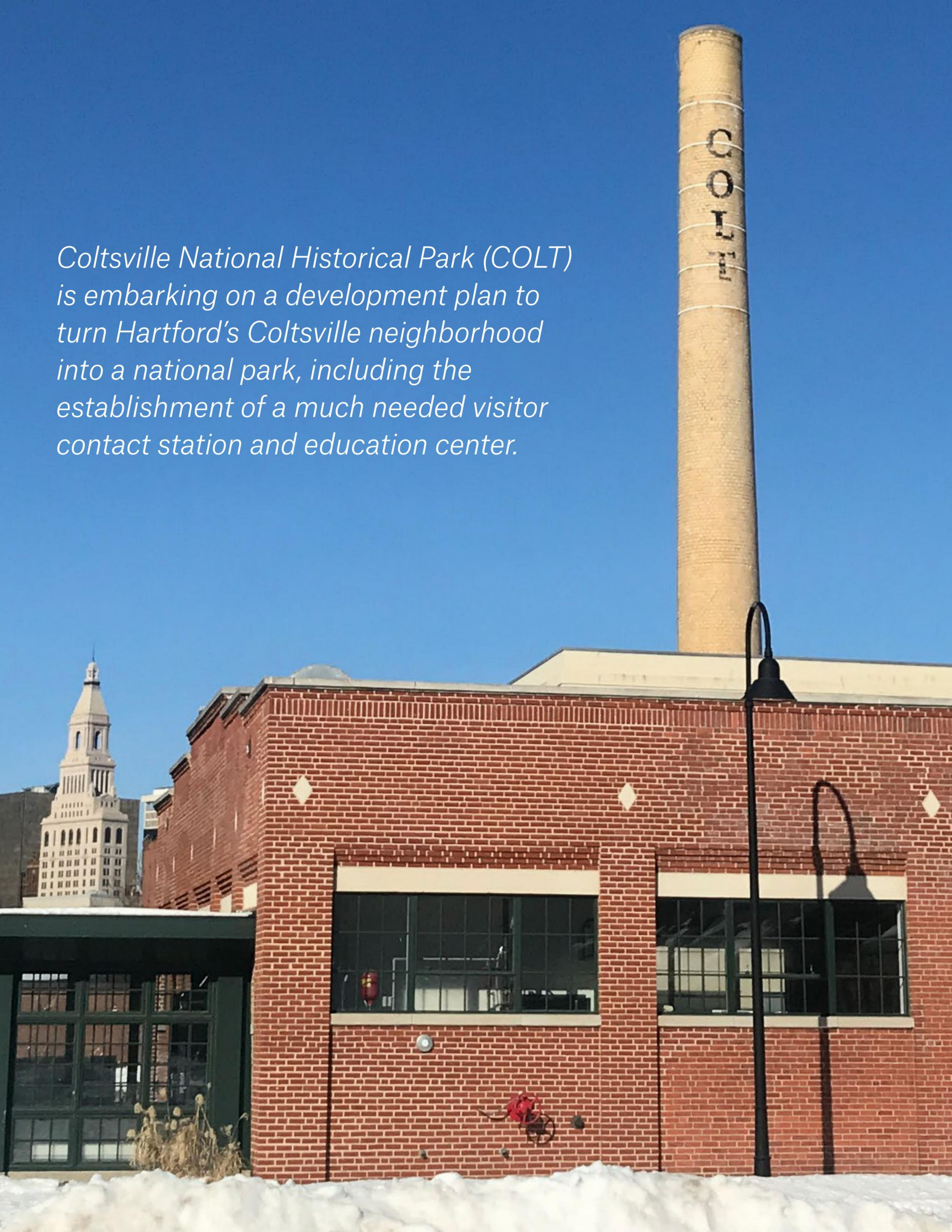
7. APPENDIX	66
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1 PROJECT SUMMARY



Coltsville National Historical Park (COLT) is embarking on a development plan to turn Hartford's Coltsville neighborhood into a national park, including the establishment of a much needed visitor contact station and education center.



Project Overview

Coltsville National Historical Park (COLT) is embarking on a development plan to turn Hartford's Coltsville neighborhood into a national park. This plan includes the establishment of a much needed visitor contact station / education center. **The Colt Armory Space Planning & Programming Study**, developed by Davis Brody Bond, will address this critical need by considering Buildings 8 and 10 in the Colt Armory, as the potential location for the visitor contact and education center. This study will evaluate the feasibility of re-purposing the two 1855 brownstones by outlining the Park's needs and comparing them to the available spatial capacity of the buildings. It will also determine and prioritize spaces tailored to the Park's interpretive needs that are not presently accommodated due to the lack of purpose-built facilities. These needs include large exhibition space, theatre, classrooms, and dedicated office spaces for Park staff members, partners and volunteers; a multi-purpose meeting room; and restroom facilities for visitors and staff members. Alternatives for the Park's administrative and operational support needs will be studied as well.

The proposed visitor center will serve as an orientation point for visitors to the multiple structures built by the Colt Patent Fire Arms Manufacturing Company including the Colt Armory; Church of the Good Shepherd; Caldwell / Colt Memorial Parish House; Colt Park; Potsdam Cottages; Armsmear and the James Colt House. It will also provide the local community with a space dedicated to the preservation and celebration of the Coltsville history. Thus, historic preservation will also be an important consideration in the planning process. The intent of the design alternatives proposed in this report will be to both preserve the buildings historical significance and provide functional space for the Park's current and future programs. This report provides an initial road map for the renovation of Buildings 8 and 10 in the Colt Armory so as to achieve the goals outlined by Coltsville National Historical Park (COLT) its network of partners and volunteers.

Site visit, Building 10 Colt Armory, Hartford, CT, June 2018



Programming Process & Project Goals

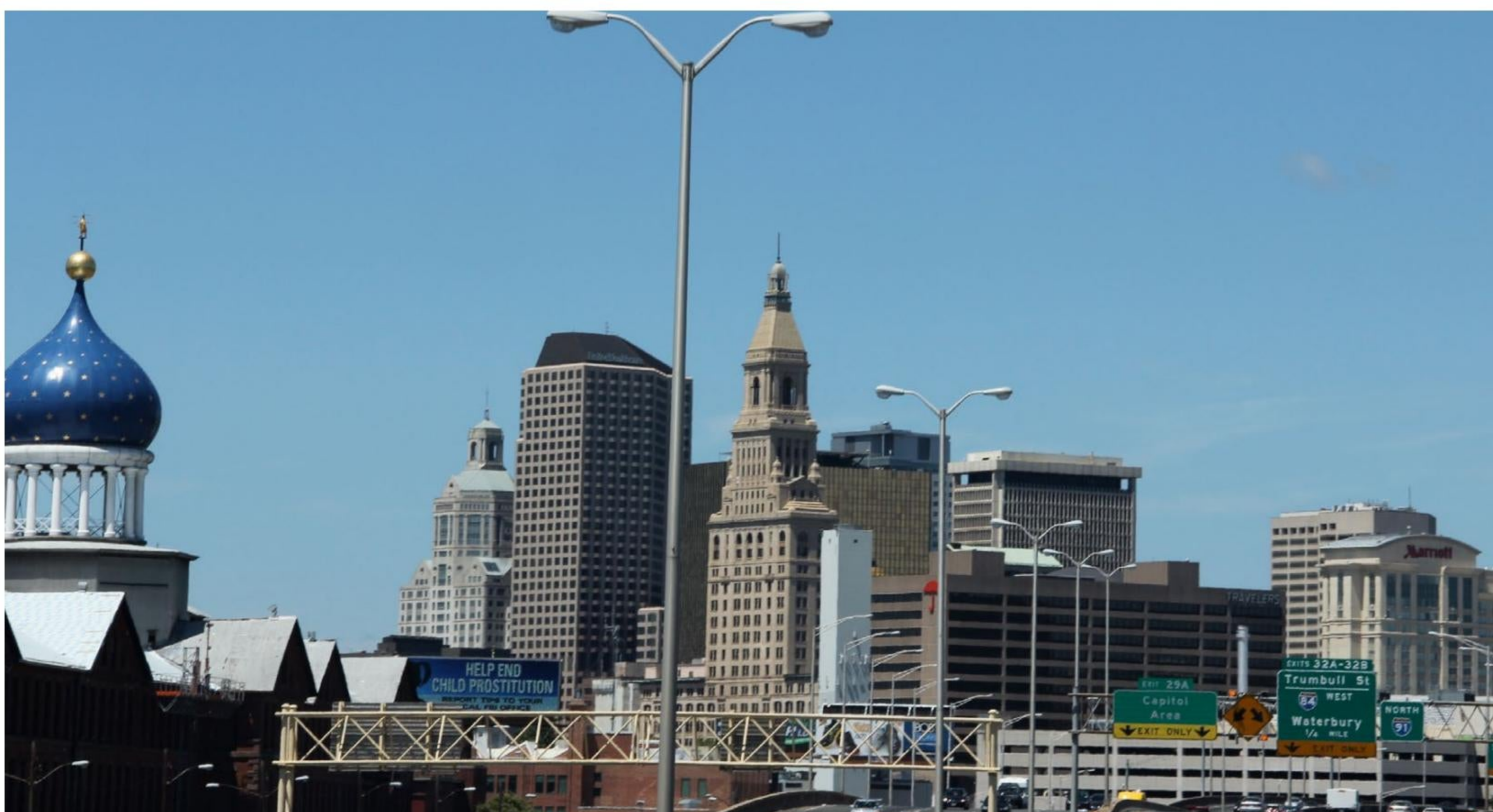
Davis Brody Bond was selected as the programming architects for the Colt Armory Space Planning, Analysis and Programming Study. Recognizing the importance of maintaining the historic value of the site, the team collaborated with COLT NHP and its conservation and preservation partners to program and re-purpose Buildings 8 and 10 in the Colt Armory in a way that meets the Park's programmatic and interpretive goals. The programming process consisted of four phases.

- **Phase 1: Project Introduction & Goals**
- **Phase 2: Data Collection & Analysis**
- **Phase 3: Concept Development**
- **Phase 4: Value-Based Decision Making.**

The initial phase allowed DBB to document the Park's current operations and identify its potential future needs. To kick off the project, the design team met with COLT / SPAR NHP staff members at the Caldwell Colt Memorial Parish. The team conducted interviews with COLT / SPAR NHP staff members and visually surveyed and photographed current conditions of multiple structures on the site including the Church of the Good Shepherd,

Caldwell Colt Memorial Parish House, Colt Park, Potsdam Cottages and the East Armory, and Building 8 & 10 in the Colt Armory. Following the staff interviews, representatives from National Park Service, Coltsville National Historical Park, COLT NHP conservation and preservation partners and the programming architects gathered to discuss their current and future work at the Park and the potential challenges and opportunities of a visitor contact and education center in the Colt complex.

Using the information collected during the kick-off meeting, the team developed and distributed programming questionnaires to the Park and its partners. The data collected both at the project kick-off meeting and through the questionnaires completed by Park and Partners, was analyzed by the programming architects and served as the basis for establishing space needs for the proposed visitor contact and education center. Programmatic needs and design recommendations or "alternatives" were developed and presented in the form of matrix, block diagrams and typical room/furniture layouts during a follow-up on site meeting with COLT NHP staff members and partners.



PROJECT GOALS

The design alternatives were grouped into two stages of development: short-term goals (1-5 years development) and long-term goals (5 years and beyond). Cost estimates were developed based on the alternatives presented during the programming meeting. A Value-Based Decision / Value-Based Inventory session took place with COLT NHP staff members and partners, the Davis Brody Bond team and key NPS personnel. The objective of the session was to select the most feasible design alternative by identifying the opportunities that maintain value and reduce cost. The results of this process are described in detail later in this report.

On-Site Meetings:

- Kick-Off Meeting (January 10 & 11, 2018)
- Programming Meeting (June 6 & 7, 2018)
- Value-Based Decision Session (July 17, 2018)

Interim Deliverables / Presentations

- Trip Report (April 10th, 2018)
- Programming Questionnaires (April 11, 2018)
- Programming Presentation (June 7, 2018)
- Value-Based Decision Session (July 17, 2018)
- Value-Based Decision Report (January 11, 2019)

The primary programming and space planning goals include the following:

1. Determine and document COLT NHP current and future programmatic needs.
2. Evaluate suitability of Buildings 8 and 10 in the Colt Armory to house the Park's programmatic and operational programs.
3. Maintain the historic integrity of Buildings 8 and 10 and preserve the Coltsville story.
4. Identify and prioritize programs that will support the Park's conservation and education missions.
5. Consider the potential development of the Park in phases or over a period of time.
6. Understand the site's history and narrative.
7. Identify the benefits of establishing Buildings 8 and 10 as a distinctive, visible and identifiable center for visitors of the Coltsville. Create a source of education and inspiration for visitors.
8. Provide spaces that allow for visitor engagement and continued partnership.
9. Foster and maintain the collaborative relationship of COLT NHP, its network of partners and the Hartford community.





Kick-Off Meeting Site Walk-Through, May 11, 2018
COLT Armory Complex, Hartford, CT



Kick-Off Meeting, May 11, 2018
Caldwell Colt Parish House, Hartford, CT



Programming Presentation, May 11, 2018
Church of the Good Shepherd, Hartford, CT

Project Team & Participants

PROJECT TEAM

National Park Service (NPS)

- Dan Dilworth
NPS Northeast Region Project Manager

Coltsville National Historical Park (COLT) and/ or Springfield Armory NHS (SPAR)

- James Woolsey, COLT/ SPAR Superintendent
- Andrew Long
COLT/ SPAR Management Assistant
- April May Preston, Chief of Administration
- Keenan Comer, COLT/ SPAR Supervisory
Facilities Operations Specialist
- Larry Turk, COLT/ SPAR
- Amy Glowacki, COLT/ SPAR
- Keith Farrar, COLT/ SPAR
- Susan Ashman, SPAR Park Ranger

Design Team:

- Mark Wagner, Davis Brody Bond Architects
(DBB)
- Astry Duarte, Davis Brody Bond Architects (DBB)
- Siva Rajan, Faithful and Gould (F&G)
- Scot McClintock, Faithful and Gould (F&G)

PARTICIPANTS

National Park Service Weir Farm National Historic Site

- Linda Cook, Superintendent
- Kevin Monthie, Supervisory Facilities Operations
Specialist

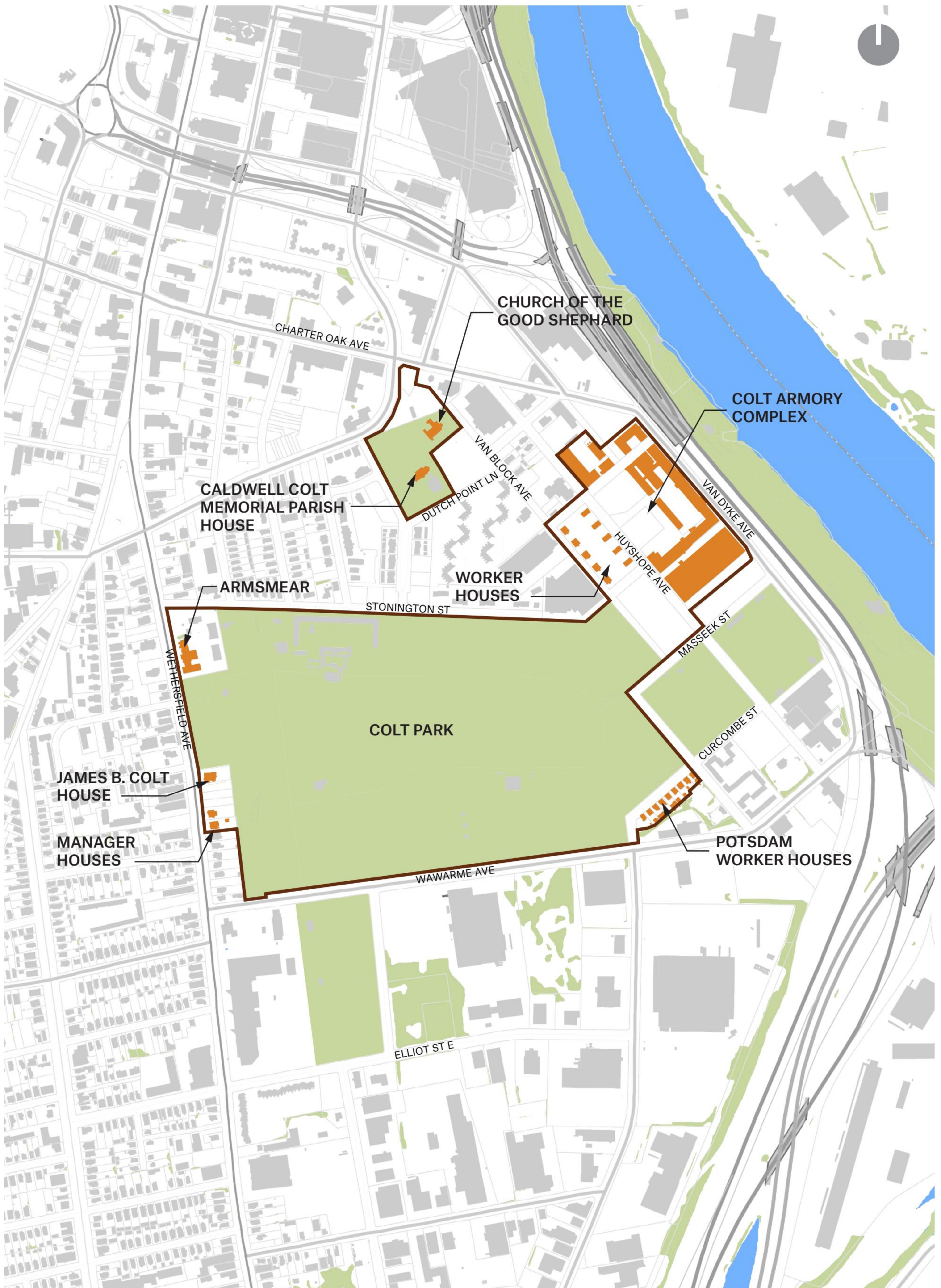
Coltsville National Historical Park Partners:

- Church of the Good Shepherd
- Coltsville Heritage Partnership
- Connecticut State Library
- Armsmear
- City of Hartford
- Museum of Connecticut History
- Wadsworth Athenaeum
- Cong. Larson Office
- COLT Gateway
- Hartford Preservation Alliance
- Connecticut Landmarks
- Riverfront Recapture
- iQuilt Partnership
- Park Watershed
- Friends of Colt Park
- Terra Firma, Northeast
- State Review Board
- Knox Foundation
- Connecticut Old State House



2 SITE ASSESSMENT & CURRENT OPERATIONS





Site Location

COLTSVILLE

Coltsville National Historical Park is a 260-acre site located at the southern edge of Hartford's downtown, in the Sheldon/Charter Oak neighborhood. The site, authorized by Congress in December 2014, includes manufacturing facilities, worker housing, community buildings, and landscape features built by the Colt Patent Fire Arms Manufacturing Company at the direction of Samuel Colt and his widow Elizabeth Colt. At the center of this historic site is the Colt Firearms Complex. The manufacturing complex was built between 1855 and 1942 with the intention of providing workers with every need, from shelter to spirituality to recreation.

From its establishment in 1855 until its decline following World War II, the complex evolved reflecting changing types of factory design and construction technologies. The Colt factory complex includes the East Armory, South Armory, and North Armory, each of which is physically connected, although they were built at different times. Ten buildings still stand today: the Forge Shop (Building 8) and Foundry (Building 10); the East Armory (rebuilt in 1867; its blue onion dome has become the premier symbol of Hartford's industrial heritage); the South and North Armories, Machine Shop, Warehouse, Power Plant, and Garage built in 1916 for World War I armament effort; and the World War II Office Building (1942). The West Armory (1861) and infill buildings located between the East and West Armories were demolished in the mid-1930s and 1947. The exterior of the surviving structures appear much as they did during the company's prime.

According to the Coltsville Special Resource Study by the National Park Service (November 2009), the buildings have not housed substantial gun manufacturing operations since the 1950s (a limited amount of firearms design and testing occurred in the Machine Shop until 1993). When the company started downsizing its operations after World War II, the historic manufacturing

machinery of the company was removed and sold off, and much of the industrial space became vacant. Some of it was subdivided for use by small businesses, artist studios, and a limited number of apartments. In 2003, a private developer Colt Gateway LLC (Homes for America Holdings, Inc.) acquired the historic industrial buildings and has been redeveloping them for commercial, residential, and office tenants.

Among the structures of historic interest on the site is the Samuel Colt Home. "Armsmear" as it is known was home to firearms manufacturer Samuel Colt and his wife Elizabeth, who oversaw the company almost forty years after her husband's death (1862 through 1901). The site also includes 19 extant dwellings for factory workers and related Colt enterprises, including ten vernacular five- or six-family tenements (1856) and nine two-family "Potsdam cottages" (1859), three Colt-owned manager houses on Wethersfield Avenue; the Victorian Gothic Episcopal Church of the Good Shepherd (1869) and its Caldwell Colt Memorial Parish House (1896); Colt Park, which was the original grounds of the Colt estate and was donated to the City of Hartford for public park purposes at the time of Elizabeth Colt's death in 1905; and the Samuel Colt's dike (1855). It is important to recognize that under Elizabeth Colt's leadership several key developments in the company occurred, such as rebuilding the armory following the disastrous fire of 1864, the Colt double-action revolvers, and the association with inventor John Browning. Elizabeth also endowed the area with the aforementioned church, parish house, and park.

As mentioned in an earlier section, Buildings 8 and 10 in the Colt Armory will be the focus of this study. The structural and spatial capacity of the two buildings will be studied and compared to the Park's programmatic demands. The results of this process and a full description of the buildings will be provided in detail later in this report.



Colt Park



Coltsville Bike Tours



Ranger-led Tours of Coltsville, Colt Park

COLT NHP Current Operations & Partnerships

COLT NHP / CURRENT OPERATIONS

Coltsville National Historical Park was authorized by Congress in December 2014. The Park is in the process of meeting the conditions for park establishment. The authorizing legislation identifies “Conditions for Establishment” and while several tasks have already been accomplished, others remain to be completed. Among the remaining tasks is the transfer of Building 8 and Building 10 in the Colt Armory to the National Park Service. The two historic brownstones will ultimately be developed into a visitor center for the Park.

As a new park, COLT NHP does not have a visitor center or any operational support facilities (a small management team for the Park operates out of Springfield Armory National Historic Site). When resources are available the Park offers limited public programs, utilizing spaces in partner sites including the Caldwell Colt Memorial Parish House and Church of the Good Shepherd. A mobile community outreach van is currently used as a mobile visitor center. Ranger-guided walking tours are provided but due to staffing and budget limitations are not regularly scheduled.

Coltsville National Historical Park includes the Colt factory complex, Church of the Good Shepherd, Caldwell / Colt Memorial Parish House, Colt Park, Potsdam Cottages, Armsmear and the James Colt House. The legislation authorizing Coltsville specifically mentions providing visitor services for the entire Park. While the Park does not own most these structures and many are not suitable for visitor access, together these historic resources have the potential to provide the public with a valuable educational experience. Visitors can get an understanding and appreciation of the Colts, precision manufacturing at the factories, and workers’ stories.

COLT NHP PARTNERS

Unlike traditional parks, COLT NHP is envisioned to be a “partnership park.” The NPS and a range of public, private and non-profit organizations work to create partnerships and affiliations in conservation, interpretation, preservation, education and recreation while managing the Park area. COLT NHP and its network of partners and volunteers work both within and beyond the boundaries of the Park site to preserve and protect historic resources associated with Coltsville and the surrounding communities.

Many of the Park’s institutional and community partners have expressed interest in participating in the collaborative efforts to create a thoughtful and comprehensive interpretive experience at Coltsville. For example, the Museum of Connecticut History (Colt Fire Arms Collection / large industrial machinery collection), Wadsworth Atheneum Museum (Sam and Elizabeth Colt personal collections which includes firearms and an important art collection), and Cedar Hill Cemetery (final resting place of the Colt family) could help tell the story of Sam and Elizabeth Colt. The collections of Colt firearms and memorabilia and precision manufacturing equipment could complement Coltsville.

Some of the Park’s partners include Church of the Good Shepherd, Coltsville Heritage Partnership, Connecticut State Library, Armsmear, City of Hartford, Museum of Connecticut History, Wadsworth Athenaeum, COLT Gateway, Hartford Preservation Alliance, Connecticut Landmarks, Riverfront Recapture, iQuilt Partnership, Park Watershed, Friends of Colt Park, Terra Firma, Knox Foundation, and Connecticut Old State House.



Church of the Good Shepherd



Parish House



Potsdam Worker Houses



Armory Worker Houses



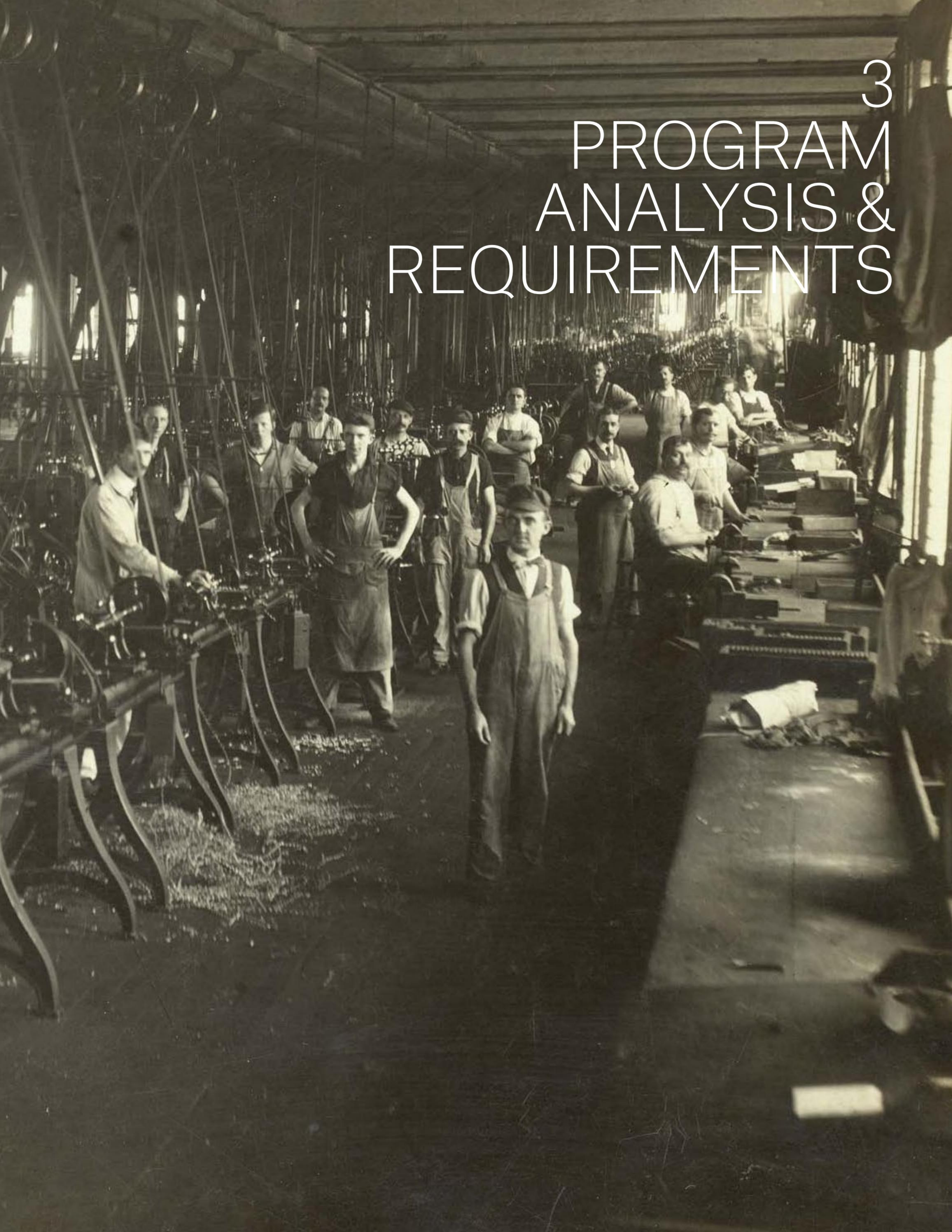
COLT Power Plant



Armsmear



PROGRAM ANALYSIS & REQUIREMENTS





Program Analysis and Requirements

DATA COLLECTION & ANALYSIS

Program requirements were provided by the Park and the partners to Davis Brody Bond both in discussion at the project kick-off meeting on January 10th and 11th 2018 and in follow up questionnaires. A total of ten partners and five COLT NHP staff members participated in the data collection process and submitted their feedback. The questionnaires asked the participants to share their long term objectives with COLT NHP, to describe desired public and non-public-facing operations at the Park and to list the programmatic requirements and/or support spaces that will help their organization achieve its goal at the Park. The responses to the questionnaires allowed the design team to gain further insight into both the quantitative and qualitative needs of the Park and its partner and volunteer groups.

Block diagrams and preliminary furniture layouts of the required program were then created to help visualize the data collected.

The program requested include information desk / visitor service area, a large exhibition space for 200 visitors, office spaces primarily for Park use and a flexible classroom for 100 students. The design team added the necessary back-of-house and non-public spaces to support the main program and allowances for general circulation.

The visitor center will be a resource for both Park and its partners to use. The goal is to provide a space that will ultimately be a benefit to the local community and Park visitors. The program requested was developed to help support the collaborative relationship between the Park and its partners through flexible meeting spaces and dedicated interpretive spaces to share the Coltsville story effectively and comprehensively. It is imperative to the Park and its partners that the visitor center be a learning and orientation space for staff and visitors. The following section summarizes the design team's findings.



The Colt Armory Space Planning and Programming Study defines a program for the project in four major areas:

	COUNT	NSF
ADMINISTRATION		
Dedicated Office, Enclosed	3	404 SF
Dedicated Workstation, Semi-open	4	192 SF
Shared Workstations, Open ("Hoteling")	4	304 SF
Conference room	1 (25 seats)	875 SF
Meeting Room	1 (10 seats)	350 SF
EDUCATION / RESEARCH		
Classrooms	1 (100 seats)	2,000 SF
VISITOR SERVICES		
Information Desk / Visitor Services	1 /bldg.	750 SF
Exhibition Area	1	6,000 SF
Theatre	1 (100 seats)	1,200 SF
Shop / Retail	1	500 SF
SUPPORT		
Pantry/ Breakroom / Lounge	1	325 SF
Restrooms	2	500 SF
Locker room / Personal Storage	1	200 SF
IT / Security Room	1	350 SF
Electrical Room	1 /bldg.	290 SF
Mechanical Room	1 /bldg.	800 SF
Work Room	1	64 SF
Copy Room	1	120 SF
Janitor's Closet	1 /bldg.	140 SF
STORAGE		
General Storage	1	180 SF
Facilities Storage	1	180 SF
Sub-Total		15,724 SF
+20% circulation		3,145 SF
Total Required Program NSF		16,316 SF
Total Available NSF		

PROGRAM REQUIREMENTS

Administration

With the establishment of a visitor center in the Park, administration space for the Park's staff and volunteers will be needed. The Park requested three dedicated office spaces for their permanent staff members and six flexible "hoteling" workstations for seasonal staff and volunteers. Personal storage and administrative support spaces were requested as well, including a large meeting room for 10 people and a conference room for 25 staff members. Flexibility for future staff growth will be included in the administrative space requirements.

Public / Interpretation Spaces

COLT NHP expressed their need for the visitor center to be a learning experience for staff members and visitors. Thus interpretation and education space were considered high priority.

A Visitor Services / Info Desk area will help visitors navigate the extensive site and understand all of the components that make up the Coltsville complex. This contact point will provide visitor basic orientation information to plan their visit and gather for Park ranger guided tours and programs. Exhibit Area is envisioned as a space that will provide necessary historical context for visitors that access the site. One of the anticipated interpretive themes will be based on the Industrial Revolution. The space is expected to include historic machinery, rotating exhibits and working demonstrations. For the programming phase, the exhibit area was designed to hold up to 200 visitors. It is important to note, the square footage provided for exhibit space reflects only the required area per occupant. The exhibit area may change once the exhibit content is further defined in later development stages.

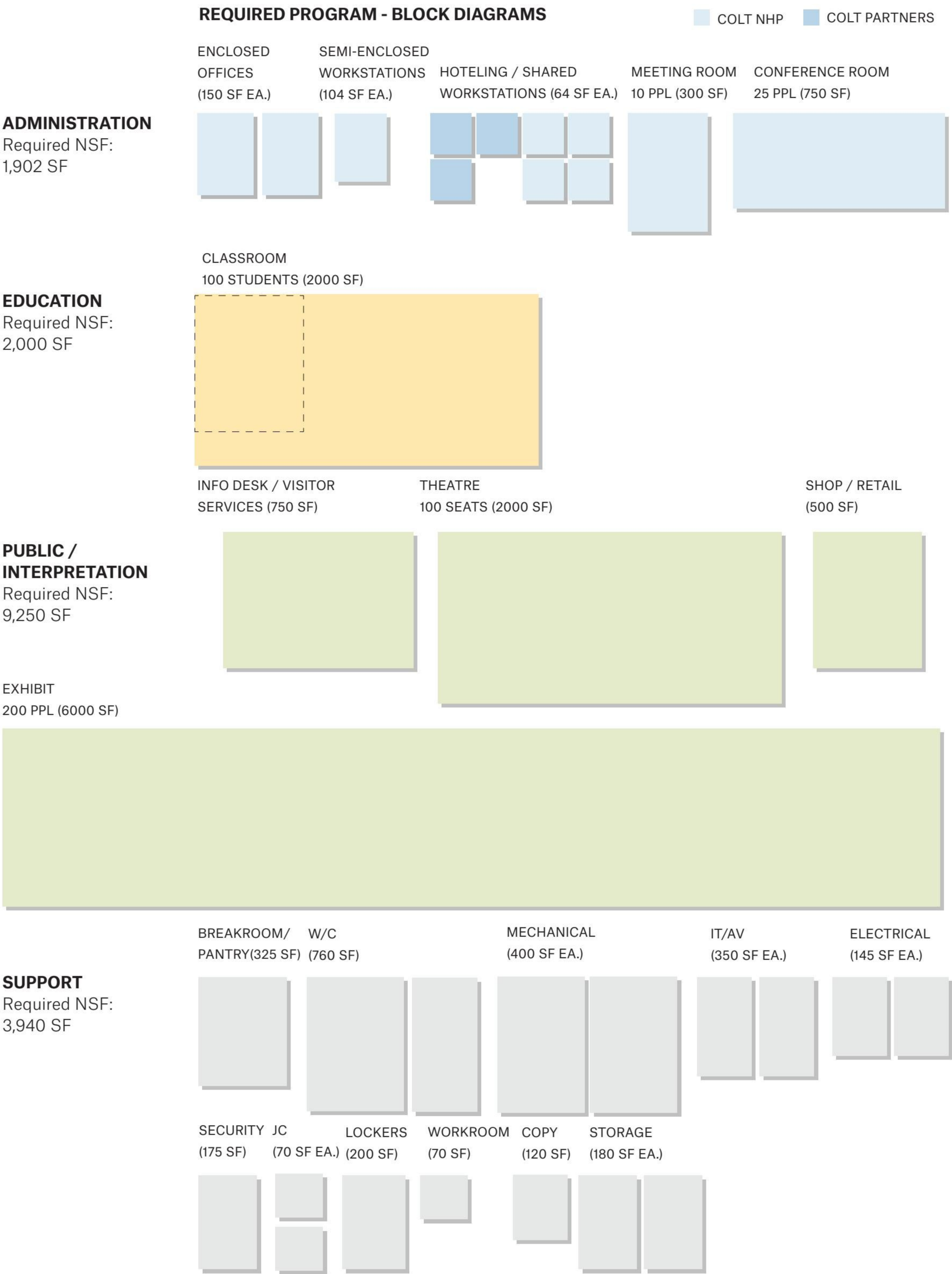
A theatre for 100 visitors was requested to as part of the Park's public / interpretation requirements. The space is anticipated to be used primarily for orientation films, but also for special programs, lectures and symposiums. A bookshop, in conjunction with visitor services and exhibit space, will help fulfill the Coltsville mission to educate the public. The shop will share the visitor services area to take advantage of exhibit and orientation visitor traffic.

Education

Education space is another priority for COLT NHP. The Park and partners described the need for an active education program where students and visitors will learn about the Colt Fire Arms Company as a highly influential national source of innovation in precision manufacturing and firearms design in the 20th century. The Park anticipates education groups of various sizes and visitation to the Park by request. The general purpose classroom for up to 100 middle and high school students will help support COLT NHPs growing education and service programs.

Support Spaces

A number of necessary support programs were not requested by the Park but will be included in the program requirements in order to sustain the operation of the building. Space will be allocated to support functions including a staff break room, restrooms, maintenance, storage, mechanical rooms etc. These functions are essential supplements to the main program.



REQUIRED PROGRAM / PRELIMINARY LAYOUTS

ADMINISTRATION

Consists of dedicated offices and “hoteling” workstations for seasonal use, and administrative meeting spaces.

EDUCATION

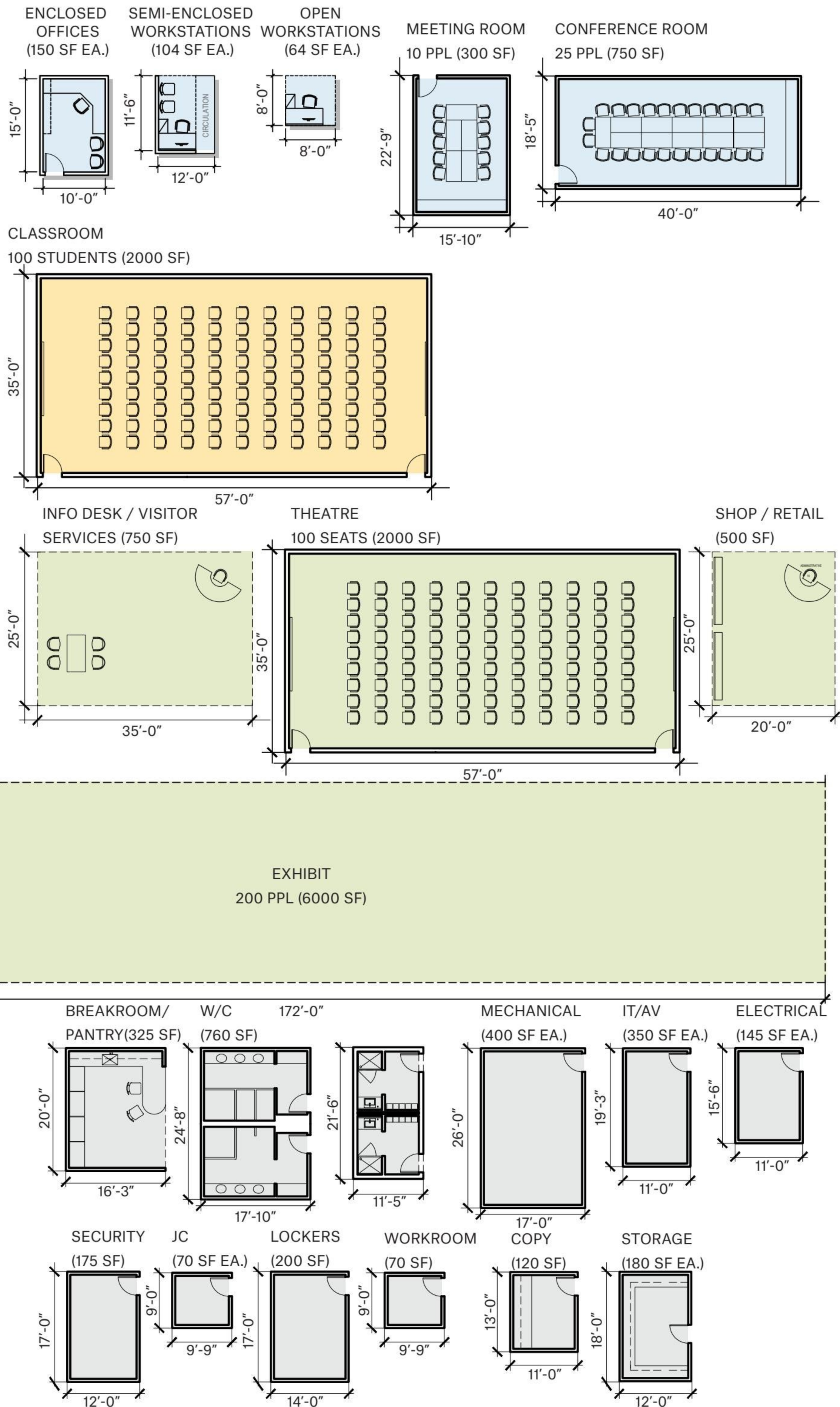
General purpose classroom to support COLT NHP’s education and service programs.

PUBLIC / INTERPRETATION

Spaces to support COLT NHP’s interpretative programs and provide site orientation.

SUPPORT

In order to sustain the operation of the building, space must be allocated to accommodate support functions. These functions are essential supplements to the main program above.





COLT Gateway parking, Buidling 10

Parking

Main public access to the visitor center is expected to be via car or public transit. The visitor center will be able to provide ±45 parking spaces in the western lot adjacent to the buildings. In addition to these spaces, visitors can use general public spaces available at the Chase Parking Lot (200 spaces).

The available resources and destinations within the legislated boundary of Coltsville are located on a walkable distance from each other and the Colt Armory. Most visitors are expected to move through the site on self-guided trails or walking tours. In addition to these trails, a viable option to consider would be biking to these locations from the visitor's center. However, this option would require the restoration of Colt Park pedestrian paths and the implementation of bike paths. Partner sites outside the boundary can be accessed by car.

Wayfinding will also be an important consideration in creating a user-friendly environment. Visitors can benefit from an effective orientation system that provides information and direction to the dispersedly located destinations in the Park. While the visitor center will guide visitors to destinations within and beyond the boundaries of the Park site, signage and other wayfinding systems can aid in destination recognition and enhance visitor experience. It is important to note that many destinations on the site are not suitable for visitor access since they are privately owned residences like the Potsdam Cottages and Armsmear. Thus, exterior interpretive signage will be an important component of the visitor experience.

The development of the parking area, alternative transportation paths, and wayfinding is not included in the scope of this study and is documented for information only. The design team recommends a site-wide access and orientation study to determine appropriate pedestrian and vehicular visitor flow and appropriate wayfinding design.

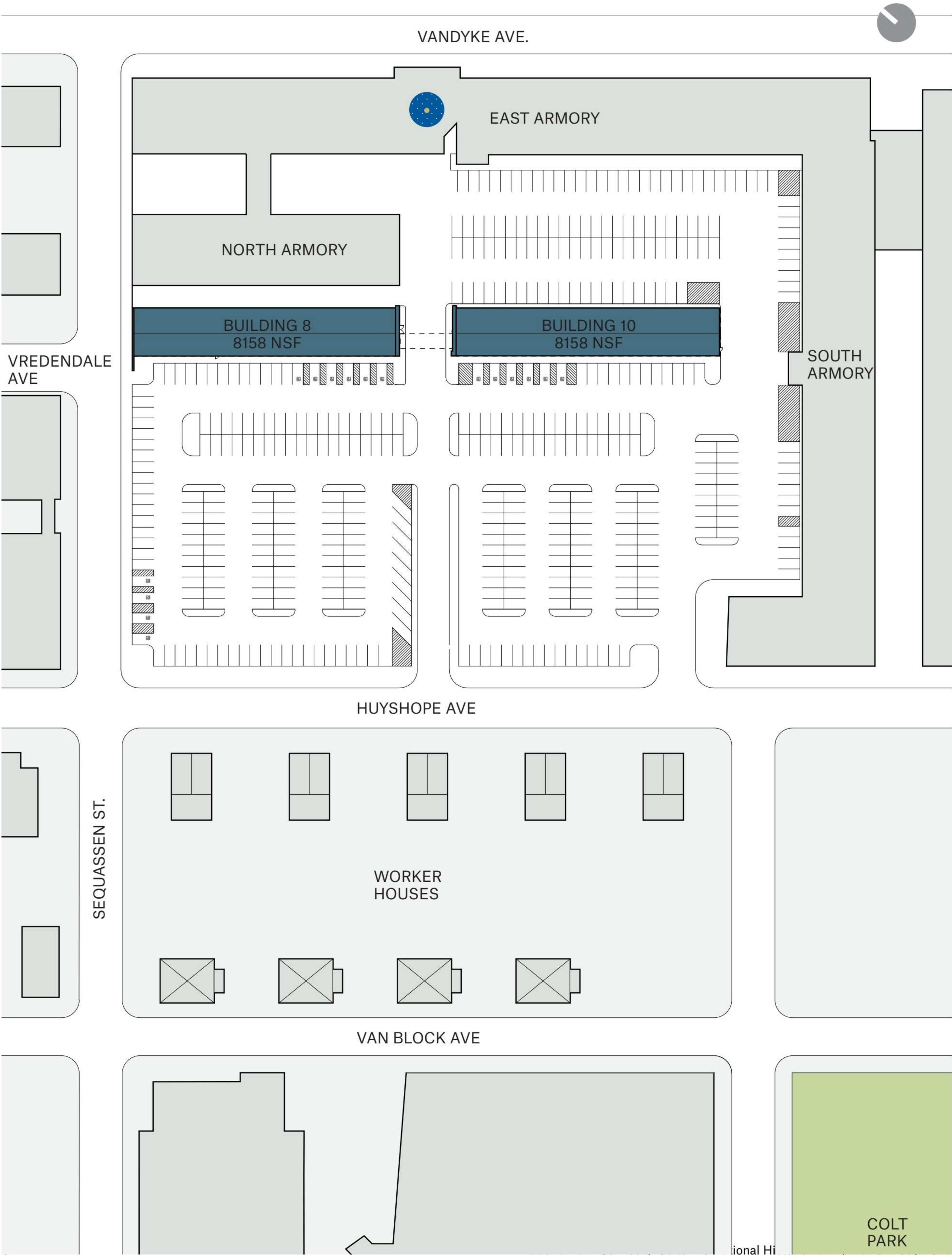


COLT Gateway parking, Buidling 8



4 COLTSVILLE ARMORY





Colt Armory Buildings 8 & 10

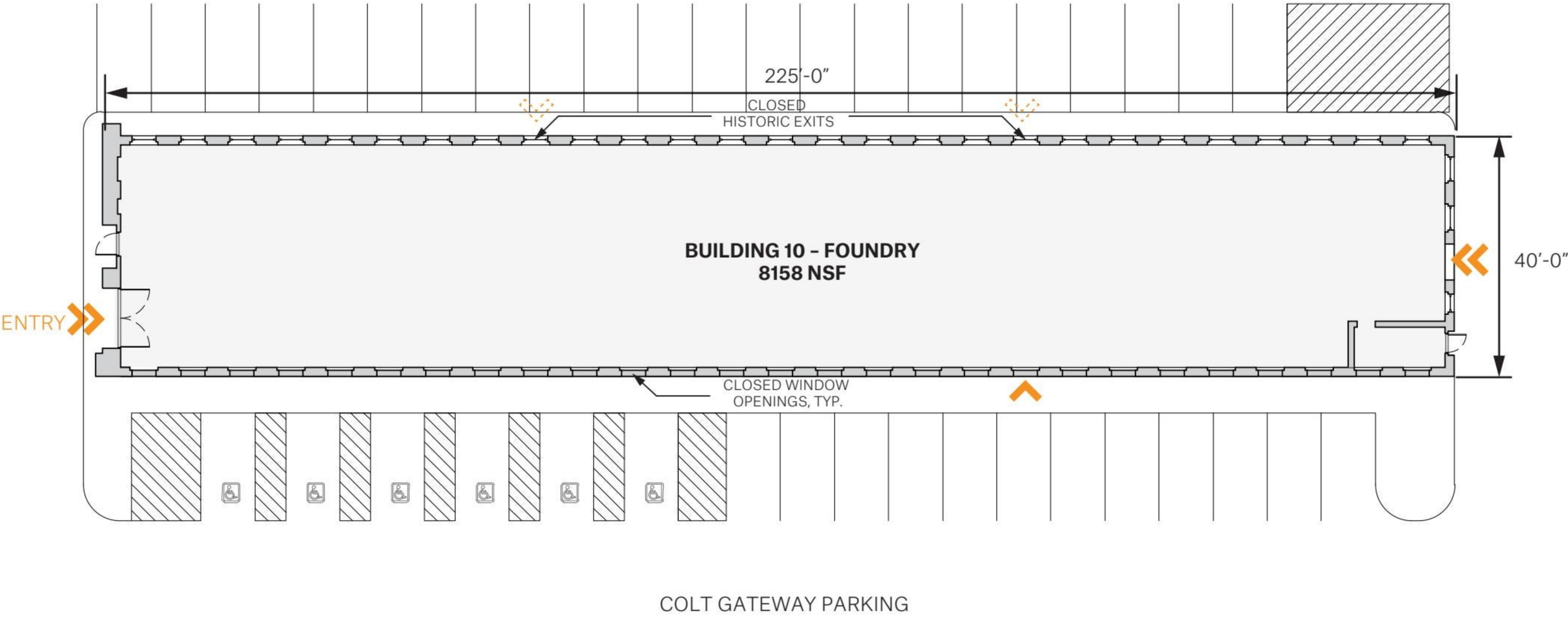
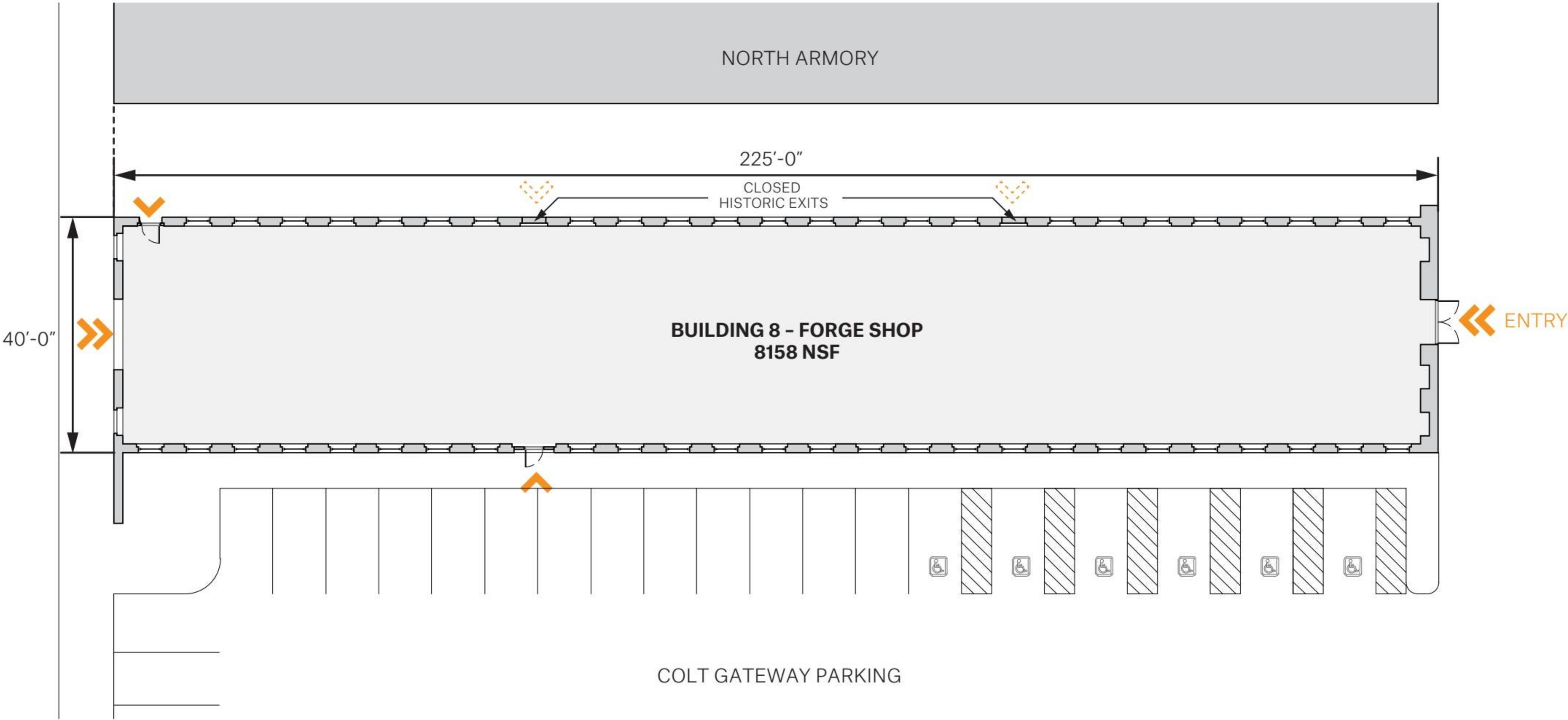
HISTORY AND PHYSICAL EVOLUTION

Buildings 8 and 10 are two of the original 1855 components of the Colt's Patent Fire Arms Company factory. Building 8 was known as the Forge Shop and was where innovative drop-forging operations took place. This original structure is a one-story gable-roofed building of random ashlar brownstone. The entire interior is open and unobstructed. Later uses of the building included woodworking and general storage. Now vacant, the Forge Shop was used mainly for storage after World War II.

Building 10 was known as the Foundry and was equipped with cupola furnace for melting iron and was then used for polishing operations and sheet-metal work. Much like Building 8, Building 10's interior is open and unobstructed and was used mainly for storage after World War II as well.

The 2008 Coltsville Historic District and National Historic Landmark nomination proposed the period of significance of both buildings to be from 1855 (the year the first factory buildings were erected) to 1945 (when World War II ended and the company began to withdraw from the complex). The original form of both buildings remains largely unchanged*. Buildings 8 and 10 were originally connected to each other by a central 'Store Room' 50 feet long and the same width, to which each had access. By 1970, the central store room was demolished and Building 8 was separated from Building 10. Some of the noticeable changes include: the addition and enlargement of doorways in both buildings; infilled window openings, bays reconstructed in brick; metal windows that replaced the majority of the originally wood windows, a steam tunnel that runs the full length of the west elevation of Building 8; piping through both buildings that brought steam to the north and south armories; and the brick skin added after the demolition of the spine that once connected the East Armory to the original west wings.

** Source: EYP Architecture and Engineering, Building 8 & 10 Historic Structure Report, (2017)*



EXISTING CONDITIONS

The programming team visually surveyed and photographed the current conditions of Buildings 8 and 10, and evaluated its suitability for the Park's future programmatic and operational needs. The following observations made by the programming team were consistent with the Building 8 & 10 Historic Structure Report developed by EYP Architecture and Engineering. As mentioned in an earlier section of this report, portions of the factory complex have been or will be rehabilitated for other uses. Buildings 8 and 10 now stand almost entirely isolated by parking lots serving the rehabilitated buildings.

Both buildings are single-story structures, ± 40 feet wide and 225 feet long. The unobstructed, column-free space in both structures are maintained by piers of brownstone ashlar that support an entablature of brick between a brownstone architrave and cornice. The building walls consist of 27 regular bays of large window openings on the east and west façades and gabled walls on the north and south facades. Although the windows were boarded up at the time of our visit, the skylights brought ample natural light into the space.

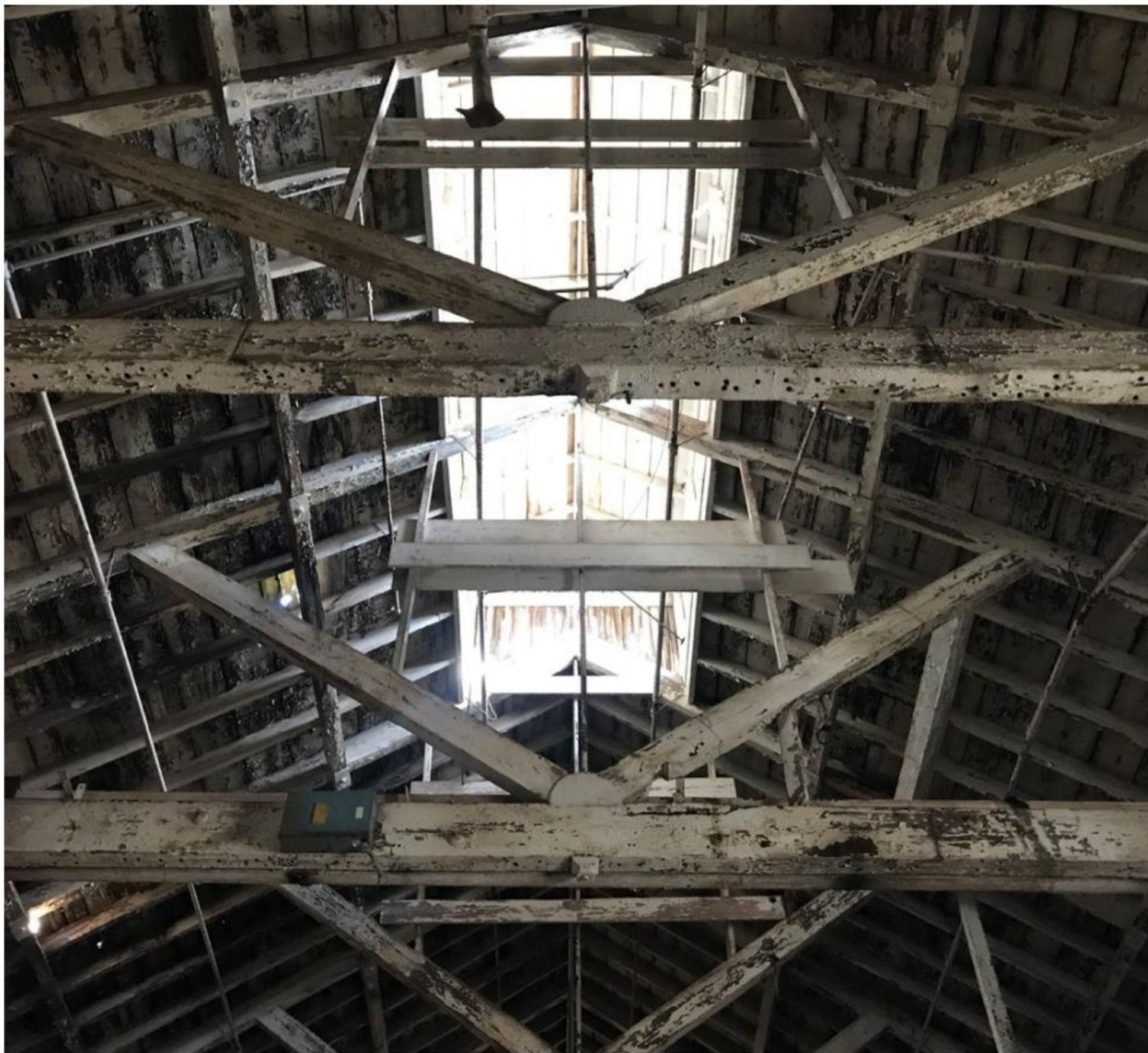
The two structures have their original gable-ended sloped roofs with slate roofing which, according to the historic structures report, are original and appear to have been patched multiple times with various materials. The roofs are supported timber trusses (set at 17 feet above the ground level floor), rafter and roofing boards bearing on the solid brownstone cornice units between windows, some of which have slightly decayed. The wood ends of many trusses have deteriorated as well.

The wooden rafters supporting the tongue-and-groove plank sub-roof / sheathing appear to be approximately $\pm 20"$ on center. The slate roofing is in poor condition in both buildings. There is water penetration in both buildings due to rusted flashing at the ridge and holes in the roof deck. There are also missing or damaged slate and wood supports along the eaves.

Some of the original components of the buildings have clearly been altered. Multiple piers at the west elevation of Building 10 and Building 8 have been rebuilt in brick and several windows in the west elevation of Building 10 have been replaced with either brick or concrete. In some cases windows openings have been enlarged and converted into large doorways, and some façades have been painted. The interior brownstone and brick walls, the underside of the roof, roofing boards, and trusses in both buildings have also been painted white and are currently in poor condition.

The floors in both buildings are concrete divided into panels with some noticeable unevenness, especially towards the north end of Building 8. Remnants of an old, inactive electrical distribution systems and sprinkler piping are present throughout both buildings. Nonfunctional standpipes are located against the east walls near the center of both buildings. Inactive insulated steam pipes run up the south wall of Building 8 and through the trusses of Building 10. There is no heating or artificial illumination in either building.





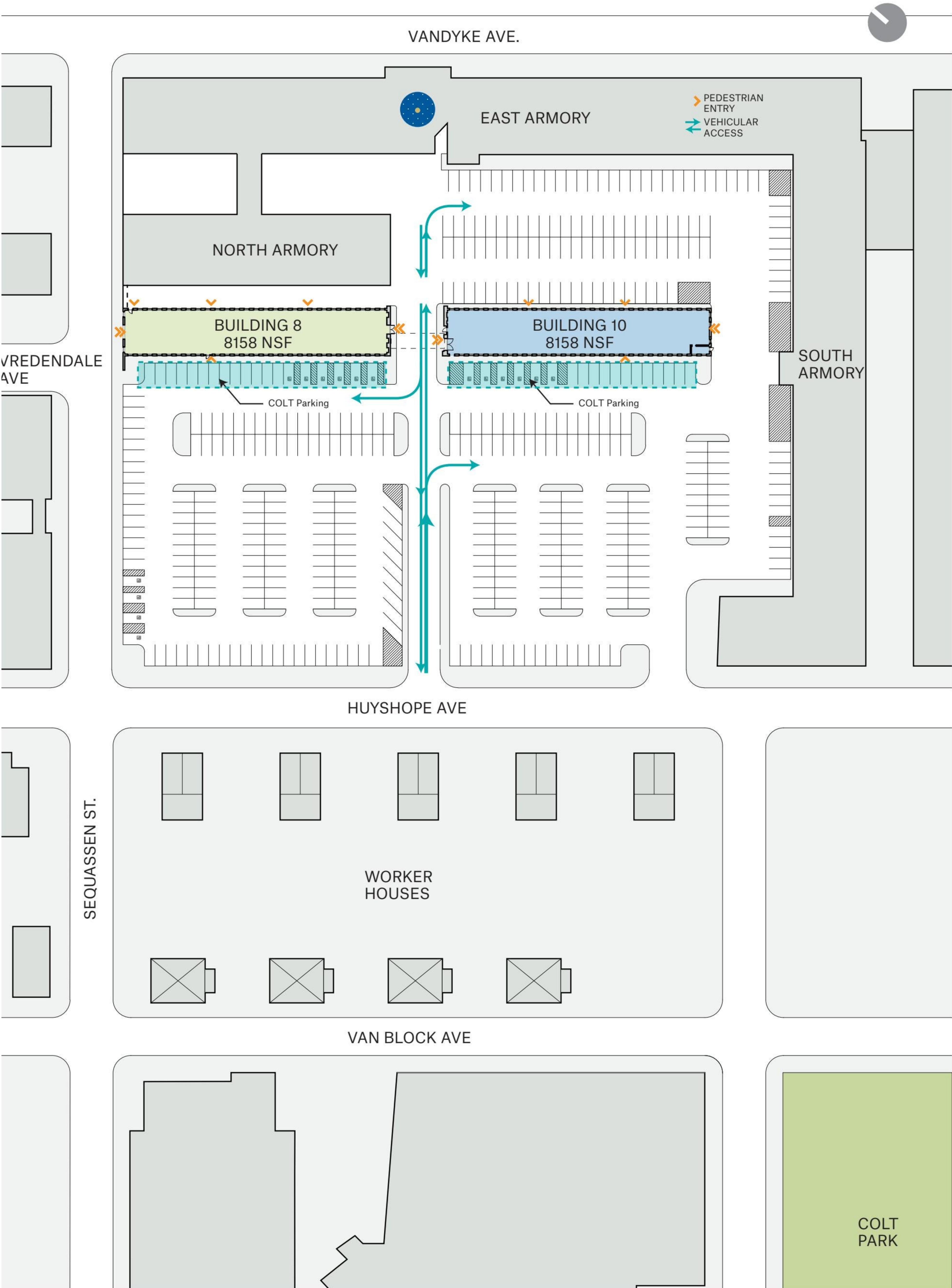






5
BUILDINGS
8 & 10
ADAPTIVE
RE-USE





Colt Armory Adaptive Re-Use

Over the course of the programming phase, the design team compared Building 8 and Building 10's capacity (approximately 16,300 nsf), to the Park's initial program needs (approximately 18,800 nsf) and determined the program requested exceeds the capacity of the buildings. The following design recommendations are the result a process of reconciling the program to the capacity of the structures.

PROGRAM ALLOCATION

Per the findings of the program analysis, it is estimated that together Buildings 8 & 10 will provide approximately 86% of the needed programmable area. In light of this deficit, the Park with the help of the design team defined programmatic priorities. Given the significant interpretive and educational potential of the Coltsville complex, the orientation/interpretation spaces were prioritized. Among the critical public functions are the information desk, bookshop, theatre for orientation films and the open exhibition space. The reconciliation involved reducing the gift shop, theatre, classroom and administrative support spaces.

The development of the two disconnected buildings required the design team to further recalibrate area requests in order to reconcile the program with the capacity of each building. Buildings 8 and 10 were originally connected to each other by a central "Store Room." Today they stand almost entirely isolated by parking lots serving the North, East, and South buildings. Internal pedestrian ways in the site are limited and most of the existing entrances to both buildings are reached from the interior of the lot on driving surfaces.

The active driveway fractures pedestrian movement between the buildings and creates a discontinuous program. It can also be difficult and dangerous for pedestrians to find and access the entrances to the buildings. Thus, access from the sidewalks and program distribution were important considerations when inserting the requested programs into the buildings.

Building 8 has the only well-defined, street-facing entrance and direct pedestrian connection from the building to the public sidewalk. Given that the majority of the space requirements are for the Park's interpretation / orientation programs, the public program will be allocated to Building 8. This approach prioritizes and facilitates pedestrian access to the building and allows for a continuous interpretative experience. Additionally, placing less dense programs (administration and education) in Building 10 reduces the difficulty of moving large quantities of visitors between the two buildings.

Site features that encourage and allow safe access for visitors and staff members must be integrated into the site. These include wayfinding signage, bicycle parking near the buildings, street crossings with prominent pavement markings between the buildings, and other traffic-calming measures. Even though the NPS would manage the areas within Buildings 8 and 10, the overall visitor center experience will include opportunities to learn about Armsmear, worker housing.



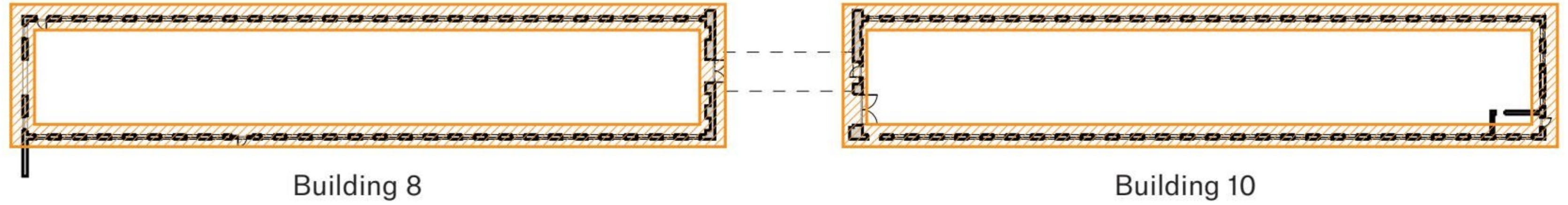
Colt Armory, view towards COLT Power Plant



SHORT TERM

OPTION A:

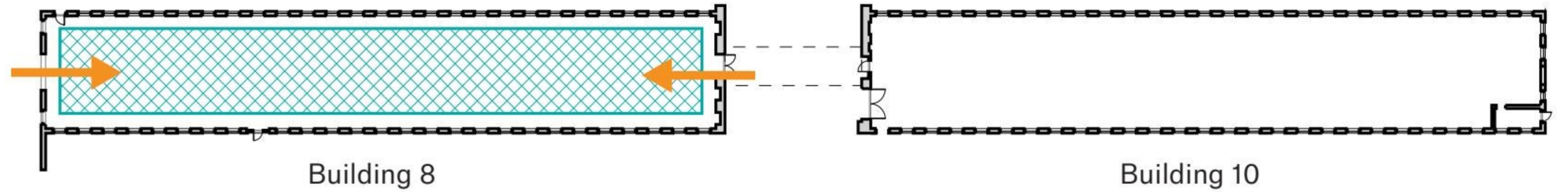
Exterior Stabilization / Restoration



INTERIM TERM

OPTION B:

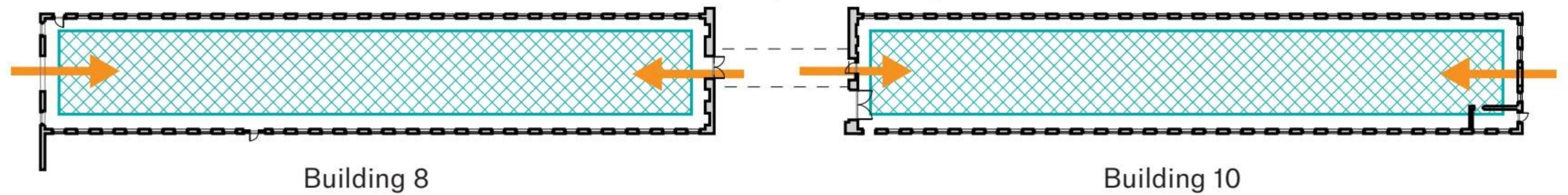
Exterior Stabilization / Restoration + Full Build out Building 8



LONG TERM

OPTION C:

Exterior Stabilization / Restoration + Full Build out Building 8 & Building 10



PLANNING PRINCIPLES

As part of the potential long term vision for COLT NHP, the development of the visitor center is being considered over a period of time that is subdivided and defined below.

Short-Term Development (1 to 5 years)

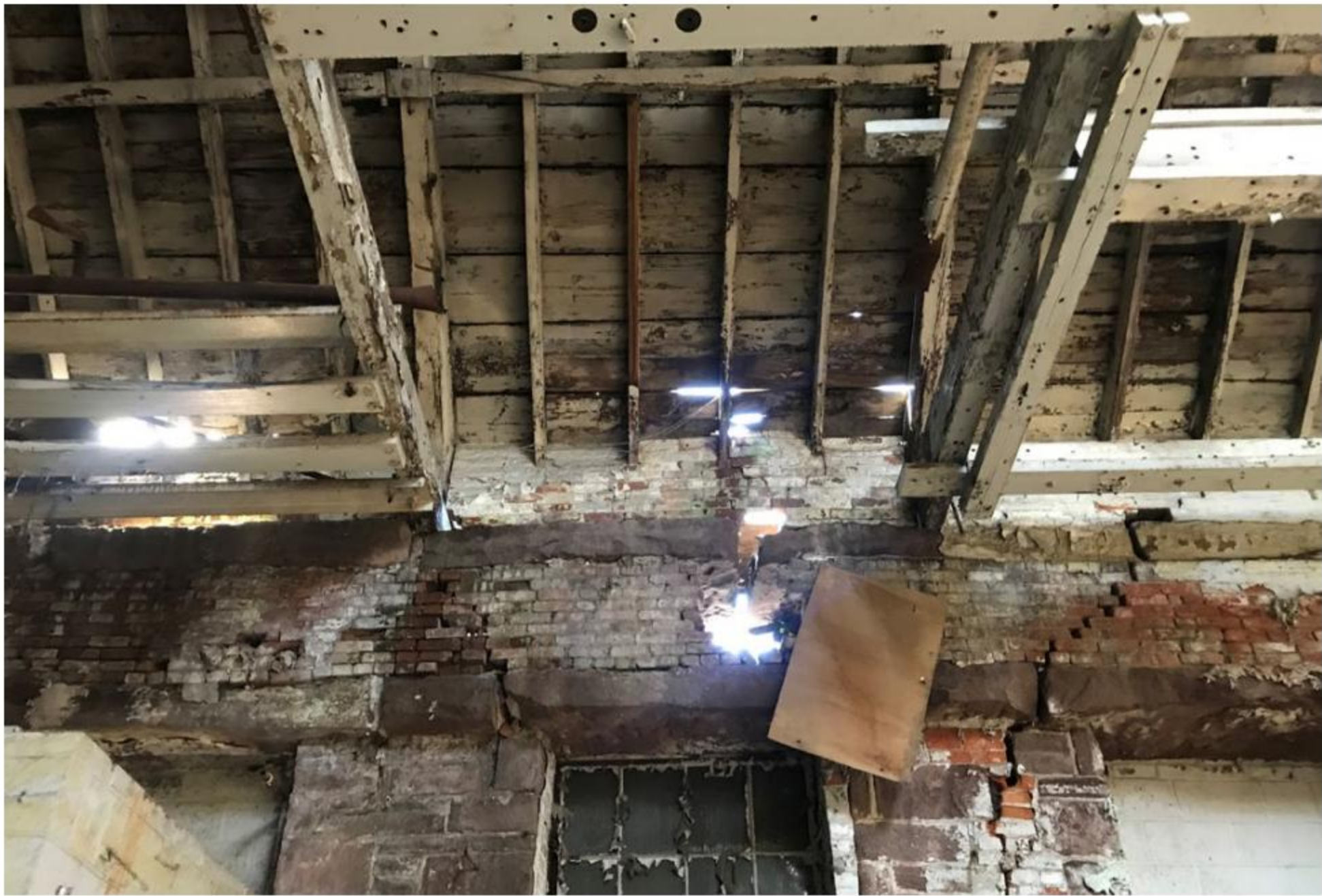
Includes the stabilization and/or historic renovation of the exterior envelope. This phase will focus on stabilizing and repairing existing historic materials, retaining and restoring the buildings' form to depict a particular period of time while the buildings are vacant.

Interim-Term Development (5 to 10 years)

Once the buildings are stabilized and deterioration is contained, this phase will focus on providing a base camp for the Park by introducing the requested program into one of the buildings.

Long-Term Development (10 years and beyond)

It is anticipated that as the Park expands so will its staff and program. Expansion to the second building will be required in order to meet the Park's projected programmatic needs. This phase is the culmination of the previous development terms and completes the conceptual layout to guide the future growth and development of visitor center. The programming of the two disconnected buildings facilitated a phased planning approach. Each development term described above provides the structure for the development of the subsequent term. This method partitions the renovation of the buildings into smaller, more manageable sections while maintaining a conceptually cohesive plan for the entire project. The duration of the development period are suggestive and can be adjusted based on funding availability and appropriateness.



Short-Term Development

SHORT TERM RECOMMENDATIONS (OPTION A)

The design team recognized the importance of bringing these historical structures back to life for both the Hartford community and new visitors to the site. The first phase of development will therefore have an emphasis on the stabilization and/or historic renovation of the envelope of Building 8 and Building 10. In order to slow down the deterioration and preserve the elements that give the buildings their character, such elements must be capable of providing proper structural support and services; deficiencies in the buildings must be corrected; and weakened and falling components of the façades must be braced or reinforced while the structures are vacant. The period of significance for Coltsville lasts from 1855 until 1945. The period of significance for Coltsville extends for nearly a century, during which the Colt Company devised innovative firearm designs and advanced precision manufacturing technology and maintained a major share of the national market for firearms. Any renovation work would need to be sensitive to the historic materials and character representative of the period of significance of the buildings. Renovation of buildings includes:

EXTERIOR

Roof

1. Remove existing roofing assembly down to sheathing. Patch and repair existing damaged tongue and groove plank sheathing as required. Replace in kind with T&G planks to match existing dimensions. Remove and replace existing damaged wood rafters.
2. Provide slate shingles on plywood sheathing, and wood purlins fastened to tongue and groove planks. Provide 2" rigid board insulation.
3. Provide copper gutters and leaders. Connect leaders to sub grade storm water drainage pipe. Provide sub grade storm water drain pipe connected to local utility.

Masonry

1. Remove and replace existing damaged stone and brick. Replace with matching brownstone and brick. Use salvages materials as available. Repoint masonry

2. Remove all existing paint from exterior surfaces and clean existing masonry. Repair stone lintels and sills as needed.
3. All original masonry openings, doors and windows shall be reconstituted and returned of original condition.

Doors and Windows

Replace all doors and windows with historic reproduction systems:

1. Windows: insulated glazing, low E, energy efficient insulated glazing single hung steel
2. Doors: Exterior wood door and frame. Provide full vision panel divided lights and insulated glazing at public entry points.

INTERIOR

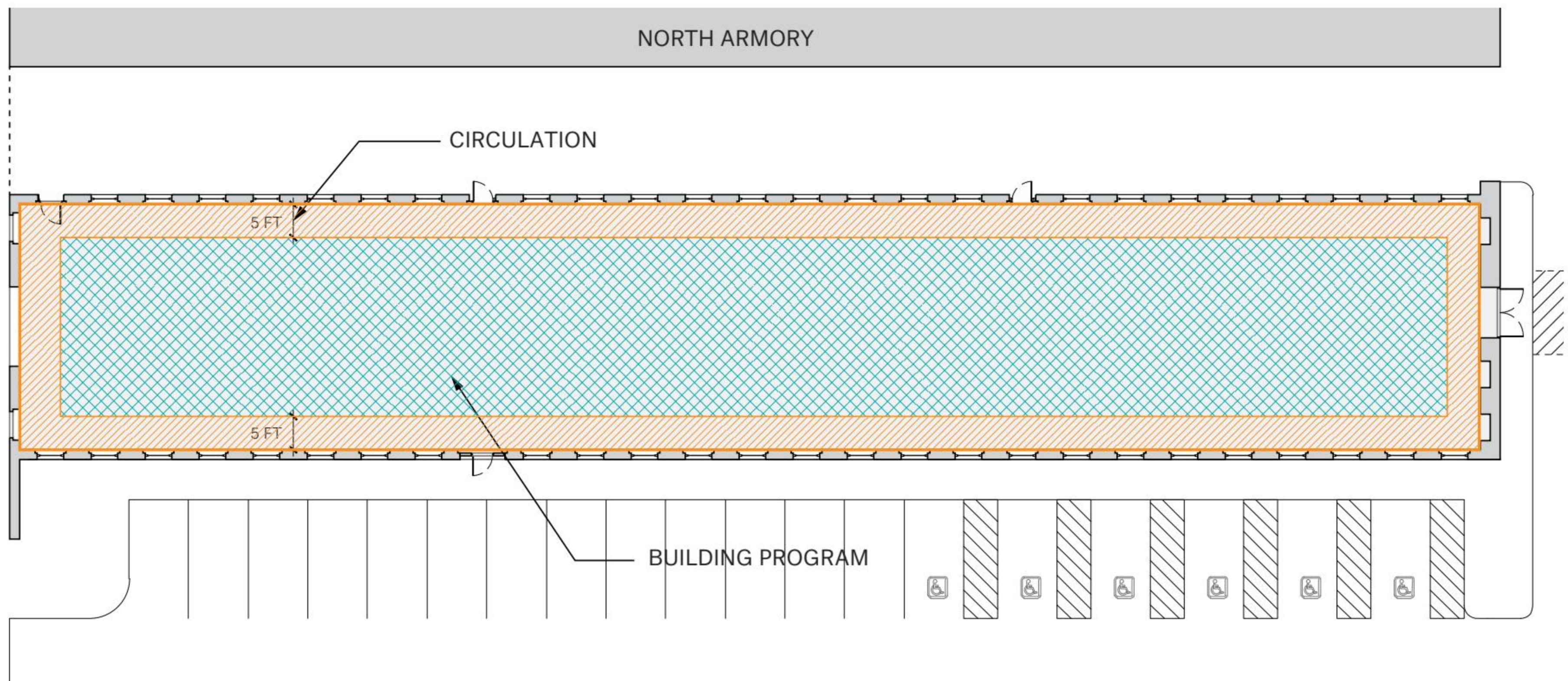
Structural Truss:

Existing wood trusses are in various state of stability. Some have been reinforced by sistering a steel channel to existing chords. Reinforce existing wood truss by similar means to the existing repairs: sister steel channel to existing wood chord.

Existing Slab on Grade:

1. Assume full removal of existing concrete slab on grade. Replace compact gravel, vapor barrier and insulated reinforced concrete pressure slab on grade. Slab on grade to incorporate radiant. floor hydronic heating.
2. Interior removals and prep.
3. Remove all existing remnant infrastructure including all conduit, electrical devices, heating elements, panels, switches, etc.
4. Scrape loose paint from all interior surfaces including walls, trusses, roof framing etc.

Public access into the buildings will not be provided during this term. However public engagement can be achieved by allowing visitors to view the interior of the structures from the north facade of Building 8 and/ or the south facade of Building 10.



Interim Development

Upon seeing the old factory buildings for the first time, the team recognized the story telling potential of their exposed bones and raw interior. The expansive unobstructed space were also noted as having great design potential. The interim term recommendations seek to develop these spaces for a new use while preserving the traces of their industrial history.

INTERIM TERM RECOMMENDATIONS (OPTION B)

In addition to the short term stabilization and renovation recommendations, the interim design option focuses on the development of the Park's public program. The majority of the Park's interpretation / orientation spaces will be located in Building 8. Of the multiple layouts studied and presented to the Park and partners, the following option was selected as the most feasible design option. This option proposes:

- 1. Stabilization /Historic Renovation of Building 8 & 10 Masonry Envelope** (see short term recommendations for detail description of required work).
- 2. Historic Restoration of Building 8 Interior** (see short term recommendations for detail description of required work).
- 3. Full Standard Fit-Out of Program** including a 48-seat theatre, Information Desk, gift shop, exhibit space, an open office and pantry for NPS staff, restrooms and other support spaces.

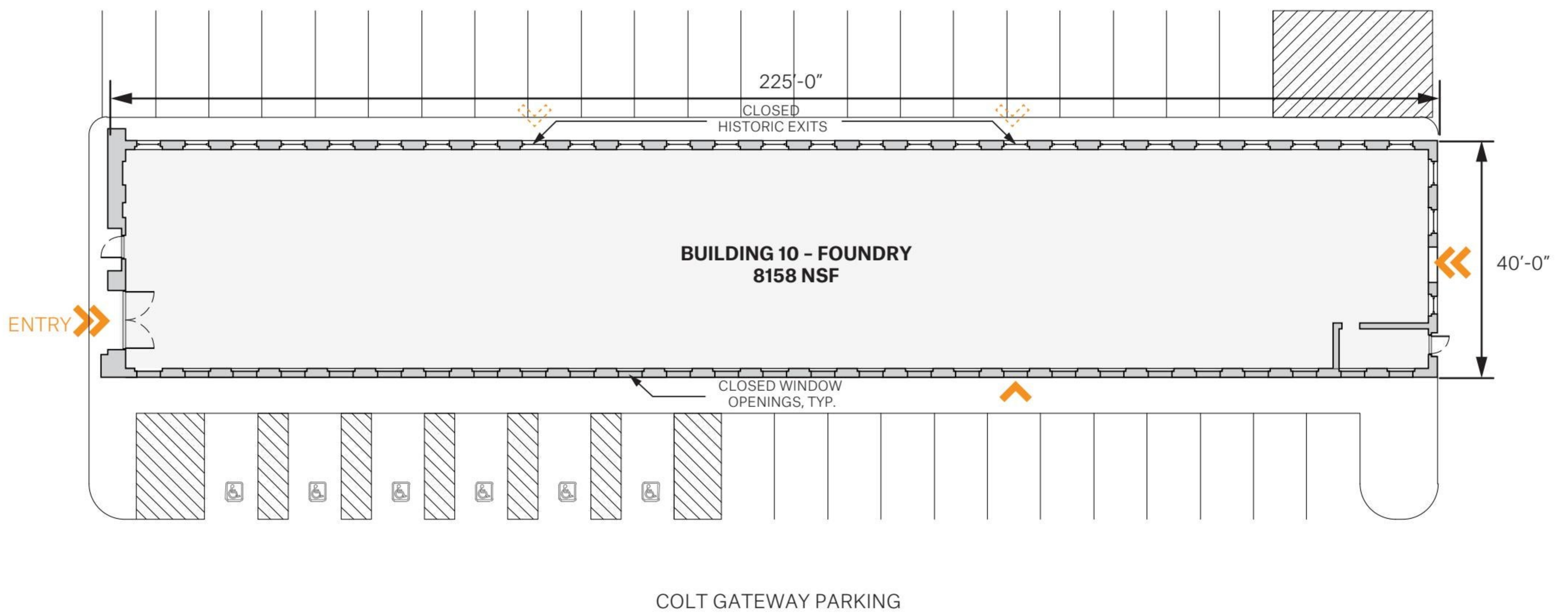
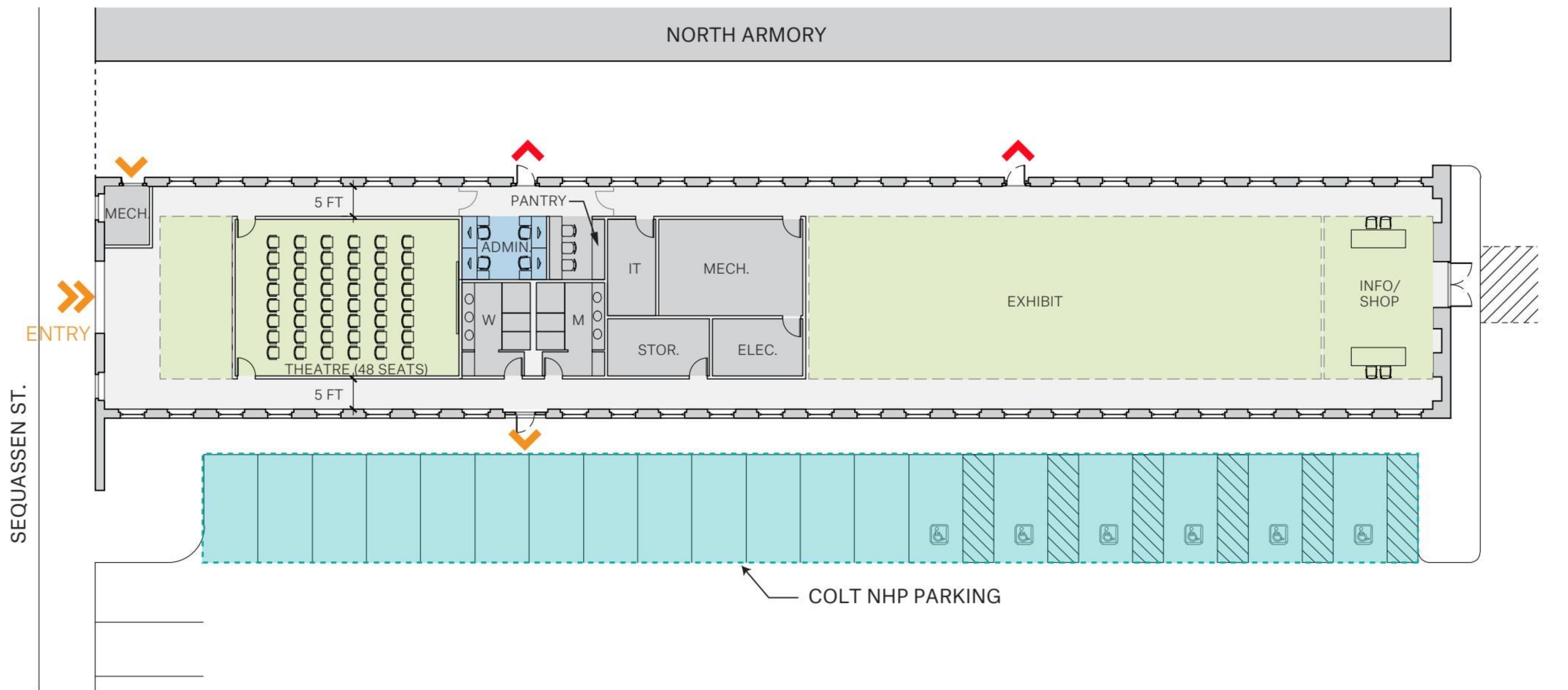
To establish the aesthetic foundation for the design concept, an emphasis on preserving as much of the buildings structure and character was made. The design team took advantage of the unobstructed, column-free space, and inserted requested programs into Building 8's interior as a distinct element that never touch the walls or ceilings of the structure. A circulation buffer will be provided between the building envelope and the requested program resulting in a "box within a box" approach. This helps further sustain and preserve the shell of the buildings and creates a vibrant dialogue between new and old.

In addition to the renovation of the two buildings, an important component of the study was the Park's education and interpretative programs. The proposed layout pushes the programmatic box to the northwest edge of the building leaving remaining open space for the Coltsville exhibition. The raw texture and patina of the industrial interior of the buildings will enhance the narrative capacities of the exhibition space. By maintaining the industrial quality of the buildings, the open exhibition and education spaces (a large component of the Park's programmatic requirements) will provide a compelling experience for visitors.

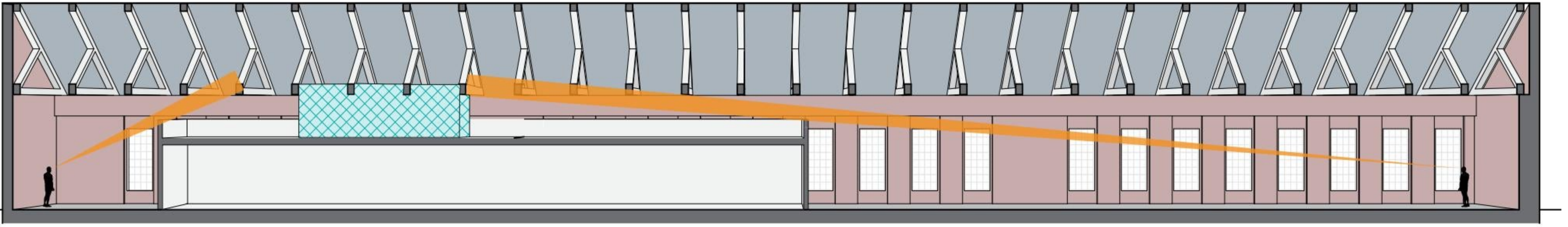


Photomontage of the freestanding "programmatic box" inside Building 10

- ADMINISTRATION
- EDUCATION / RESEARCH
- PUBLIC / SHARED
- SUPPORT



Long-Term Development



BUILDING 8
SECTION A-A
Sightlines Diagram

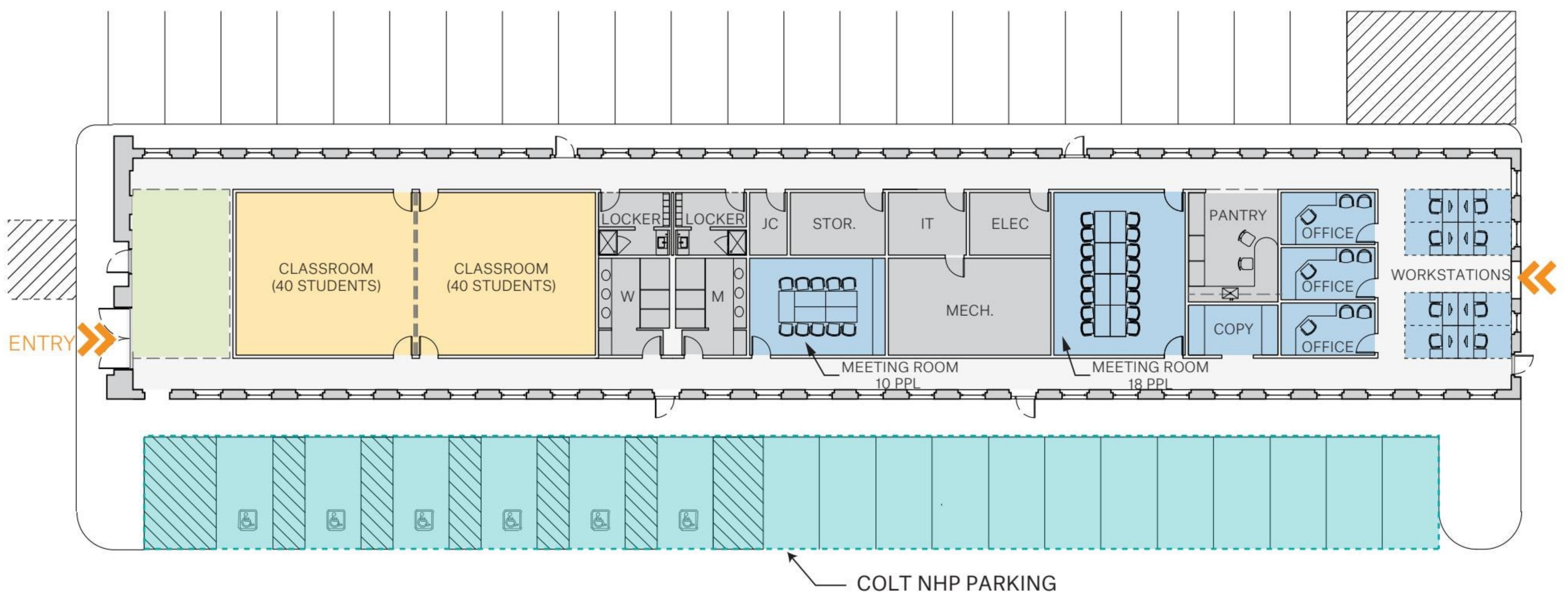
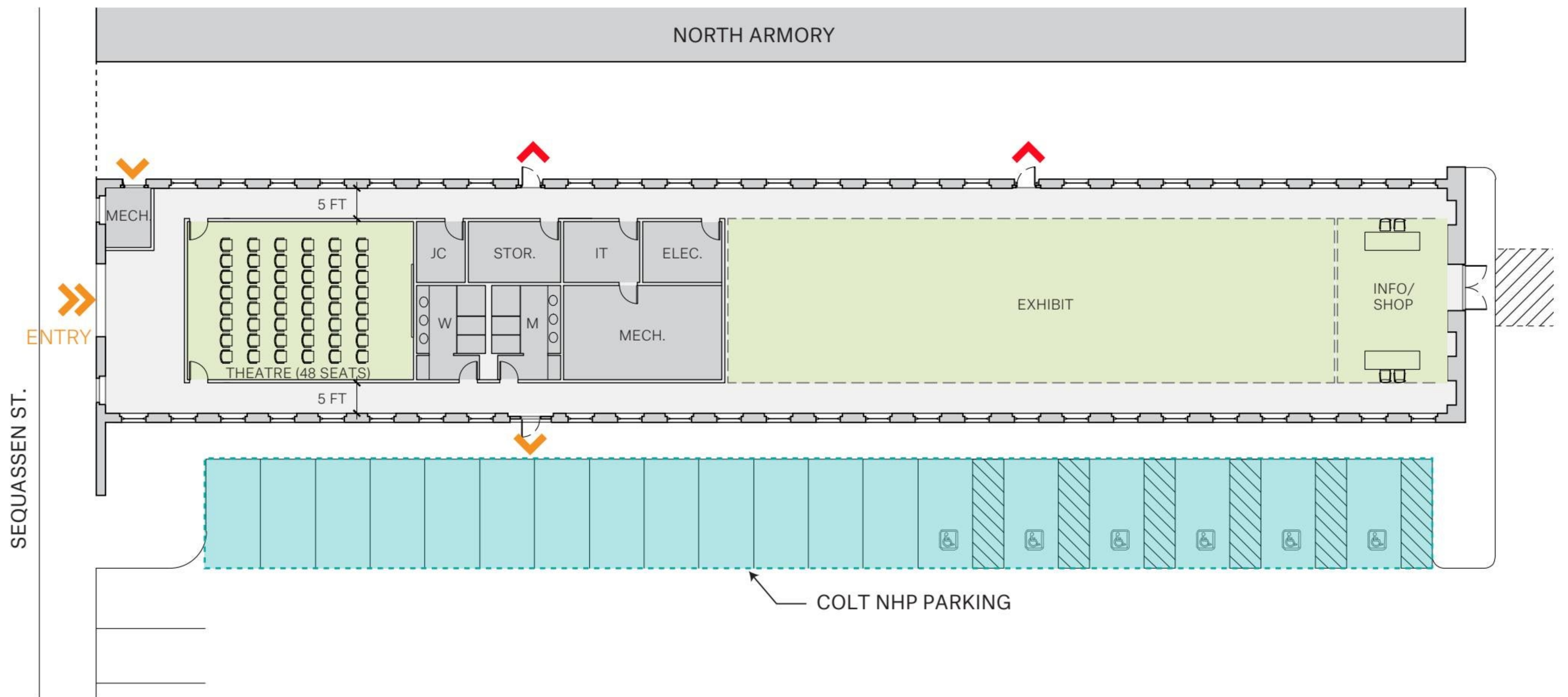
LONG TERM RECOMMENDATIONS (OPTION C)

Expansion to the second building will be required in order to meet the Park's projected programmatic needs. While Building 8 will be dedicated to the Park's public program, building 10 will house the administration and education programs. In addition to the short and interim term recommendation, this option proposes:

- 1. Stabilization / Historic Renovation of**
Building 8 and Building 10 masonry envelope (see short term recommendations for detail description of required work).
- 2. Historic Restoration of Building 8 and Building 10 Interiors** (see short term recommendations for detail description of required work).
- 3. Full Standard Fit-Out of Building 8 Program**
including a 48-seat theatre, information desk, gift shop, exhibit space, restrooms and other support spaces.
- 4. Full Standard Fit-Out of Building 10 Program**
including a two 40-seat classrooms, meeting rooms, enclosed and open offices for NPS staff, restrooms and other support spaces.

The "box within a box" approach is maintained in the proposed layout for Building 10. A circulation buffer is also provided between the envelope and the requested program. Considering the building program requested exceeds the capacity of the buildings, the available space can be maximized by strategically positioning a mezzanine level for mechanical spaces above the freestanding programmatic box. The buildings height and the continuous row of trusses can be used to block the line of sight to the mechanical spaces and the box can be solely dedicated to the main program (see section AA p. 53).

- ADMINISTRATION
- EDUCATION / RESEARCH
- PUBLIC / SHARED
- SUPPORT







6 VALUE BASED DECISION SESSION



Value-Based Decision Session

The options listed below were studied and presented to the Park and partners during the Value-Based Decision session. The objective of the session was to select the most feasible design alternative by identifying the opportunities that maintain value and reduce cost.

	Alt Option A	Option A	Alt. Option B	Option B Most Feasible	Option C Design Alternative
Core and Shell Work					
Stabilization Building 8	•	•	•	•	•
Stabilization Building 10	•	•	•	•	•
Historic renovation Building 8		•	•	•	•
Historic renovation Building 10		•	•	•	•
Mechanical Systems					
Building 8			•	•	•
Building 10			•	•	•
Interior Historic Renovation					
Building 8			•	•	•
Building 10			•	•	•
Standard Interior Fit-Out					
Partial buildout Building 8:			•		
<i>Theatre, information desk, gift shop, open office, pantry, restrooms & support spaces.</i>					
Full buildout Building 8:				•	•
<i>Theatre, information desk, gift shop, exhibit, open office, pantry, restrooms & support spaces.</i>					
Full buildout Building 10					•
Site Accessibility					
Parking re-striping & signage	•	•	•	•	•
Additional sitewide wayfinding & signage, bicycle parking, street crossings etc.					

The Value Based Decision session for the Colt Armory was the process selecting an optimal design solution for the project through a structured and reasoned analysis of the factors and functions related to rehabilitation of Building 8 and Building 10. COLT NHP staff members and partners, key NPS personnel and the design team gathered to discuss the viable alternatives that meet the Park's essential functional requirements. The VBD session focused on the following study objectives:

1. **Selecting "preferred alternatives"** using Choosing By Advantages (CBA) and Life Cycle Costing (LCC) for recommendations developed during the programming process
2. **Establishing programmatic priorities**
3. **Identifying potential ways of protecting and preserving the Park's natural and cultural resources**
4. **Identifying ideas to add value to the project**
5. **Sharing Information**

PROCESS

Faithful + Gould acted as the facilitator for the session held at the Church of the Good Shepherd, on July 17th 2018. The following steps were taken to select the most feasible design alternative. The design options addressing all appropriate planning considerations were presented by DBB to the Park and partners during the information phase of the session. The critical functions for the project and their associated costs and value were discussed. A Function Analysis Systems Technique (FAST) Diagram for the project was developed and presented by F+G. It graphically illustrates the interrelationships of projects functions and helped develop the evaluation factors. The advantages of the options presented were then determined and weighed against each other using specific evaluation factors in the Choosing by Advantages (CBA) exercise. The resulting Importance Score for each option is then divided by the Initial Cost or, where available, the Life-Cycle Cost, to determine an Importance to Cost Ratio, which measures value (see appendix for FAST diagram, CBA matrix and cost estimates).

PLANNING CONSIDERATIONS

The Colt Armory space planning and programming study grouped the Park's needs into three stages of development: short term, interim term and long term. During the programming process, specific considerations were identified as critical to the project. In addition to the Park's programmatic needs, these considerations guided the development of the design alternatives proposed for each stage and contributed to the selection of the preferred alternatives.

1. **Full Stabilization of the Exterior Envelope:** In order to slow down the deterioration of the buildings, deficiencies must be corrected, weakened or falling components of the façade must be braced or reinforced while the buildings are vacant.
2. **Historic Preservation / Renovation:** Any renovation work would need to be sensitive to the historic materials and character representative of the period of significance of the house.
3. **Partial Build-Out vs. Full Build-Out (project phasing):** partitioning the renovation of the buildings into smaller sections allows project to move forwards despite there being no guarantee of funding for a complete renovation. A partial build out gives the Park the opportunity to occupy one of the structures and provides a public face for visitors.
4. **Programmatic Prioritization:** Both Building 8 and Building 10 will need to be occupied in order to meet the Park's needs. If the project is to be developed in phases, the Park/Partners will need to prioritize their programmatic requests. Given the significant interpretive and educational potential of the Coltsville complex, the development of the public program spaces should take precedence.



Value Based Decision session held at the Church of the Good Shepherd
Hartford, CT, July 17th 2018

MOST FEASIBLE DESIGN ALTERNATIVE

The design options developed addressed a strongly stated desire to maintain the historic integrity of the buildings while providing a space to for the Park to operate. The Park and partners recognized the importance of preserving the historic structures and the role it plays in sustaining and preserving the cultural heritage of the area. During CBA exercise, historic preservation / renovation of the structures and full buildout of the both buildings were selected as the items that added the most value to the project.

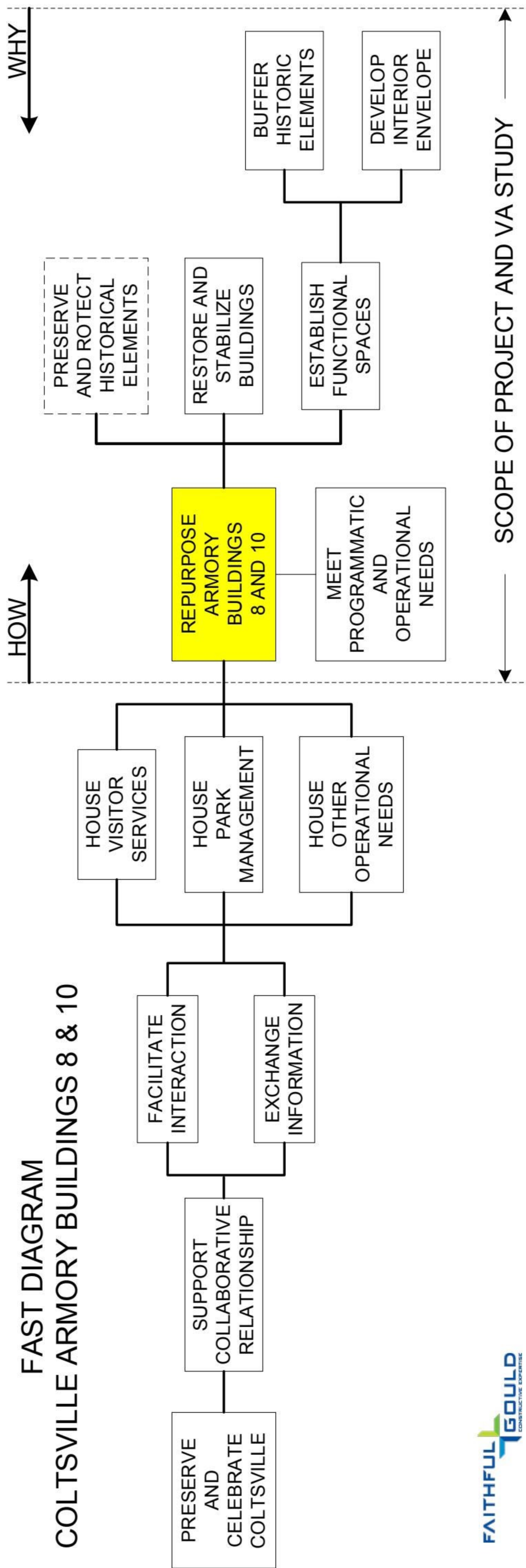
The interim recommendation (Option B) was selected as the most beneficial design alternative. This option moderately establishes the visitor center by prioritizing the development of one building. It includes the exterior historic stabilization and renovation of both buildings 8 and 10 and the interior renovation and standard fit out of building 8.

While this option does not meet the Park's full programmatic requirements, it offers the best value at a more modest capital cost than other options. Option B provides the following advantages:

- 1. Creates public face and begins visitor use.**
- 2. Allows for greater community engagement**
- 3. Provide space for critical functions including exhibit and administrative space.**
- 4. Allows Park to begin on site operations**
- 5. Makes Park a real destination**

The benefits of completing the design all at once as proposed in Option C was discussed. It was determined that preserving the design momentum, ensuring a consistent vision and fully establishing its projected program are beneficial moves for the Park but require a higher estimated capital cost. Option C was selected as a design alternative.

FAST Diagram



Choosing by Advantages Matrix

Coltsville National Historical Park- COLT - 236702A

Coltsville Armory Buildings 8 & 10

Choosing by Advantages

COMPONENT: Armory Buildings 8 & 10			FUNCTION: Repurpose Armory Buildings 8 & 10		
FACTOR	ALTERNATIVES				
	Option 1 – Exterior Stabilization/Restoration	Option 1A – Exterior Stabilization / Restoration / Preservation	Option 2 – Option 1 + Minimal Build-out - Building 8	Option 3 – Option 1 + Full Build-out - Building 8	Option 4 – Option 1 + Full Build-out - Building 8 and Building 10
PROTECT CULTURAL AND NATURAL RESOURCES					
FACTOR 1 & 2 - Prevent Loss of, Maintain, and/or Improve Condition of Resources					
What does this option offer to prevent the loss of, maintain and/or improve the condition of cultural resources?					
Attributes	- Stabilize buildings - Makes useable for all options - Stabilizes earliest artifacts of the park	- Stabilize buildings - Makes useable for all options - Stabilizes and preserves historic fabric of earliest artifacts of park - Preserve history of the exterior	- Gets building occupied - Begins public use - Creates public face on the street - Adds life safety items - Contributes to broader resource - Buffers historic fabric	- Completes occupancy of the building - Increasing attention to ongoing condition of the building	- Completes occupancy of both buildings - Increasing attention to ongoing condition of both buildings
Advantages	Prevents or slows down further loss of resources	10 Prevents or slows down further loss of resources and preserves historic fabric of the exterior	30 Public use begins with related attention to resources	50 Increased public use with more attention to resources of entire building	60 Maximum public use with more attention to resources of both complete buildings
PROVIDE FOR VISITOR ENJOYMENT					
FACTOR 3 - Provide Visitor Services and Educational and Recreational Opportunities					
What does this option offer to provide visitor services and educational and recreational opportunities?					
Attributes	Stabilizing buildings so they can be seen	- Stabilizing buildings so they can be seen - Preserves historic fabric so it can be seen and interpreted.	- Creates useable space - Chance to interpret building from inside - Gives park time to determine what the visitors want	- Significant space for exhibition and programming - Allows normal size book store - Makes park a real destination - Allows public to pass through the building	- Allows the park to hold educational programs - Significant support space for larger program opportunities - More functionality for other programs - Supports partners
Advantages	Buildings can be seen	20 Historic fabric can be seen and interpreted	50 Establishes visitor services in shortest time	80 Expands and enhances visitor services	90 Significantly expands and enhances visitor services

COMPONENT: Armory Buildings 8 & 10			FUNCTION: Repurpose Armory Buildings 8 & 10		
FACTOR	ALTERNATIVES				
	Option 1 – Exterior Stabilization/Restoration	Option 1A – Exterior Stabilization / Restoration / Preservation	Option 2 – Option 1 + Minimal Build-out - Building 8	Option 3 – Option 1 + Full Build-out - Building 8	Option 4 – Option 1 + Full Build-out - Building 8 and Building 10
FACTOR 4 - Protect Public Health, Safety and Welfare					
How well does the option protect public health, safety and welfare?					
Attributes	• Safer external space near buildings	• Safer external space near buildings	• Adds life safety items • Adds bathrooms	• Adds life safety items • Adds bathrooms • More comfortable and welcoming space	• Adds life safety items to both buildings • Adds bathrooms to both buildings
Advantages	Minimal 10	Minimal 10	Meets needs of one entire building 10	Meets needs of one entire building 45	Meets needs of both entire buildings 60
IMPROVE EFFICIENCY OF PARK OPERATIONS					
FACTOR 5 - Improve Operational Efficiency and Sustainability					
How operationally efficient and environmentally sustainable is this option?					
Attributes	• Sustains exterior of buildings	• Sustains exterior of buildings • Sustains historic fabric of buildings	• Creates useable space • Begins operation • Begins income stream • Staff on site vs remote	• Increased visitation • More income stream	• Allows the park to hold educational programs • Significant support space for larger program opportunities • More functionality for other programs • Supports partners
Advantages	None 0	Sustains historic fabric 30	Begins operation 50	Increases operations 60	Maximizes operation 70
FACTOR 6 - Protect Employee Health, Safety and Welfare					
How well does the option protect employee health, safety and welfare?					
Attributes	• Safer external space near buildings	• Safer external space near buildings	• Adds life safety items • Adds bathrooms • Much less travel	• Adds life safety items • Adds bathrooms • Much less travel	• Adds life safety items • Adds bathrooms • Much less travel
Advantages	Employees can approach building safely 10	Employees can approach building safely 10	Less employee travel required 40	Less employee travel required 40	Least employee travel required 60

COMPONENT: Armory Buildings 8 & 10		FUNCTION: Repurpose Armory Buildings 8 & 10			
FACTOR		ALTERNATIVES			
	Option 1 – Exterior Stabilization/Restoration	Option 1A – Exterior Stabilization / Restoration / Preservation	Option 2 – Option 1 + Minimal Build-out - Building 8	Option 3 – Option 1 + Full Build-out - Building 8	Option 4 – Option 1 + Full Build-out - Building 8 and Building 10
PROVIDE COST-EFFECTIVE, ENVIRONMENTALLY RESPONSIBLE, AND OTHERWISE BENEFICIAL DEVELOPMENT FOR THE NPS					
FACTOR 7 - Provide Other Advantages to the National Park System					
What other advantages does this option offer the National Park System?					
Attributes	- Stabilize two assets - Establishes presence - Shows NPS commitment	- Stabilize two assets - Establishes presence - Shows NPS commitment - Preserves historic fabric	- Maintains flexibility - More efficient use of staff time - Shows increased NPS commitment	- Can begin exchange of artifacts with other parks and partners - Maintains some flexibility - More efficient use of staff time - Economy of scale - Shows increased NPS commitment	- Allows the park to hold educational programs - Fully establishes park - Economy of scale - Allows NPS to fully engage with partners - Shows full NPS commitment
Advantages	20	40	60	90	80
	Stabilized assets	Preserves historic fabric	Physical park presence	Greater community engagement	Greater community and partner engagement
Total Importance of Advantages	70	170	325	395	440
Capital Cost (Net)	\$4,400,000	\$5,500,000	\$5,600,000	\$6,100,000	\$7,800,000
Re-design Cost					
Compliance					
Life Cycle Cost (Net)					
Importance/Capital Cost (\$M)	15.91	30.91	58.04	64.75	56.41

Green Circle represents Most Important Advantage in a Factor

Red Underline represents Least Preferred Set of Attributes

Project Cost Summary

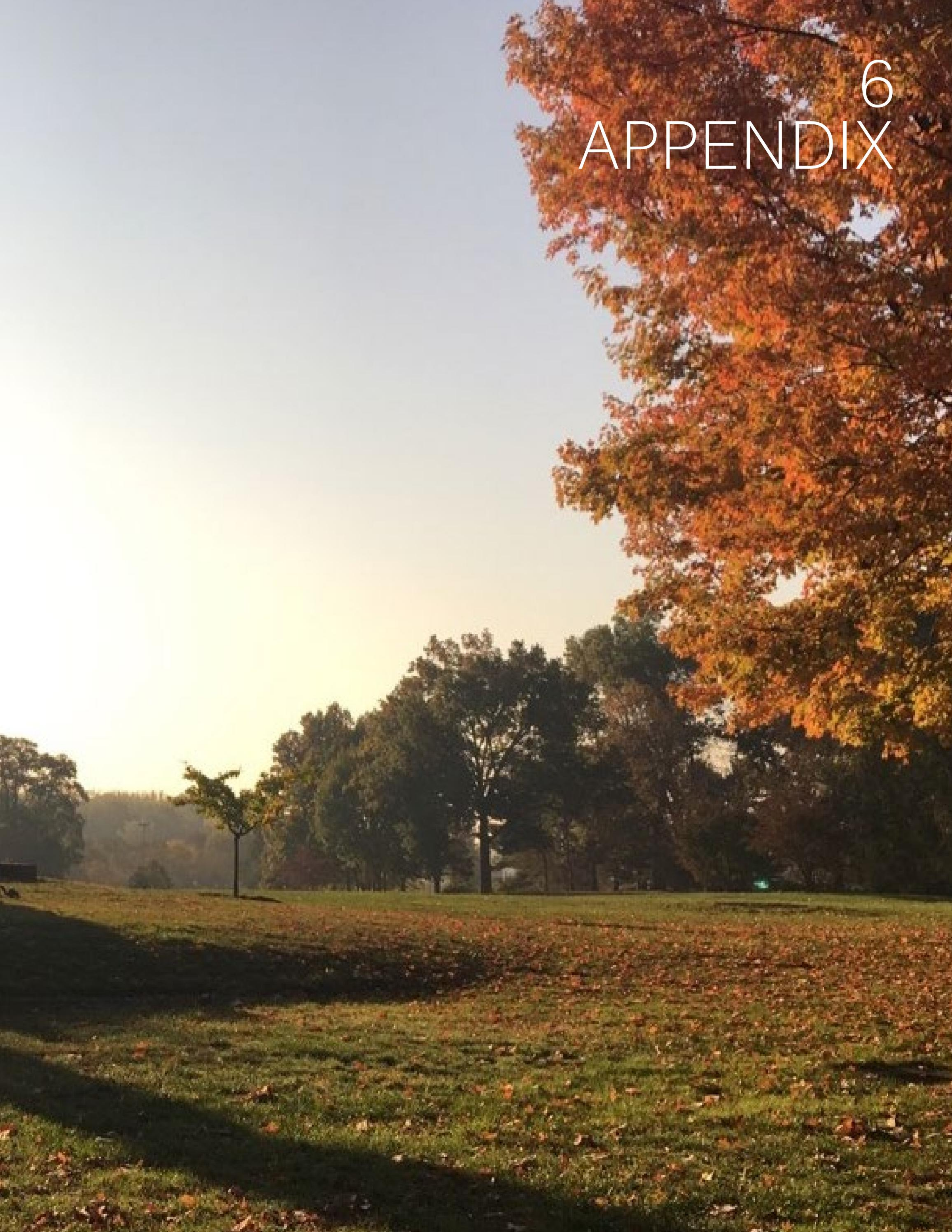
United States Department of the Interior
National Park Service
Class C Construction Cost Estimate

Project: Coltsville NHP Planning			Estimate By: KL					
Park: Coltsville National Historical Park, Hartford CT			Date: 03/21/19					
Park Alpha: COLT			Reviewed By: SR					
PMIS Number: 236702A			Date: 03/21/19					
PROJECT COST SUMMARY								
BUILDINGS 8 & 10								
ITEM NO	WBS	Description	OPTION A ALT	OPTION A	OPTION B ALT	OPTION B	OPTION C	
1	A10	FOUNDATIONS	\$ 538,428	\$ 538,428	\$ 538,428	\$ 538,428	\$ 538,428	
2	B10	SUPERSTRUCTURE	\$ 161,180	\$ 161,180	\$ 161,180	\$ 161,180	\$ 161,180	
3	B20	EXTERIOR ENCLOSURE	\$ 919,460	\$ 1,331,400	\$ 919,460	\$ 919,460	\$ 919,460	
4	B30	ROOFING	\$ 269,214	\$ 489,480	\$ 269,214	\$ 269,214	\$ 269,214	
5	C10	INTERIOR CONSTRUCTION	\$ -	\$ -	\$ 167,889	\$ 180,621	\$ 473,403	
6	C20	STAIRS	\$ -	\$ -	\$ -	\$ -	\$ -	
7	C30	INTERIOR FINISHES	\$ -	\$ -	\$ 63,406	\$ 86,381	\$ 180,945	
8	D10	CONVEYING SYSTEMS	\$ -	\$ -	\$ -	\$ -	\$ -	
9	D20	PLUMBING SYSTEM	\$ -	\$ -	\$ 45,013	\$ 91,620	\$ 183,239	
10	D30	HVAC	\$ -	\$ -	\$ 141,750	\$ 285,530	\$ 571,060	
11	D40	FIRE PROTECTION	\$ -	\$ -	\$ 61,185	\$ 61,185	\$ 122,370	
12	D50	ELECTRICAL SYSTEM	\$ -	\$ -	\$ 249,262	\$ 322,044	\$ 640,087	
13	E20	FURNISHING	\$ -	\$ -	\$ -	\$ -	\$ -	
14	F10	SPECIAL CONSTRUCTION	\$ -	\$ -	\$ -	\$ -	\$ -	
15	F20	SELECTIVE BUILDING DEMOLITION	\$ -	\$ -	\$ -	\$ -	\$ -	
16	G10	SITE PREPARATION	\$ 938,824	\$ 988,824	\$ 938,824	\$ 938,824	\$ 938,824	
SUBTOTAL DIRECT CONSTRUCTION COST			\$ 2,827,106	\$ 3,509,312	\$ 3,555,610	\$ 3,854,486	\$ 4,998,210	
			\$ -	\$ -				
			\$ 2,827,106	\$ 3,509,312	\$ 3,555,610	\$ 3,854,486	\$ 4,998,210	
REMOVEDNESS FACTOR			0.0%	\$ -	\$ -	\$ -	\$ -	
DESIGN CONTINGENCY			15.0%	\$ 424,066	\$ 533,341	\$ 578,173	\$ 749,731	
			\$ 3,251,172	\$ 4,035,709	\$ 4,088,951	\$ 4,432,659	\$ 5,747,941	
STANDARD GENERAL CONDITIONS			10.0%	\$ 325,117	\$ 408,895	\$ 443,266	\$ 574,794	
GOVERNMENT GENERAL CONDITIONS			5.0%	\$ 178,814	\$ 224,892	\$ 243,796	\$ 316,137	
HISTORICAL PRESERVATION FACTOR			3.0%	\$ 112,653	\$ 141,682	\$ 153,592	\$ 199,166	
			\$ 3,867,757	\$ 4,801,081	\$ 4,864,420	\$ 5,273,313	\$ 6,838,038	
OVERHEAD			5.0%	\$ 193,388	\$ 240,054	\$ 263,666	\$ 341,902	
PROFIT			5.0%	\$ 203,057	\$ 252,057	\$ 276,849	\$ 358,997	
			\$ 4,264,202	\$ 5,293,192	\$ 5,363,024	\$ 5,813,827	\$ 7,538,937	
BONDS AND PERMIT			3.0%	\$ 127,926	\$ 158,796	\$ 174,415	\$ 226,168	
INFLATION ESCALATION			0.0%	\$ -	\$ -	\$ -	\$ -	
TOTAL ESTIMATED NET COST OF CONSTRUCTION			\$ 4,392,128	\$ 5,451,988	\$ 5,523,914	\$ 5,988,242	\$ 7,765,105	
SAY			\$ 4,400,000	\$ 5,500,000	\$ 5,600,000	\$ 6,000,000	\$ 7,800,000	

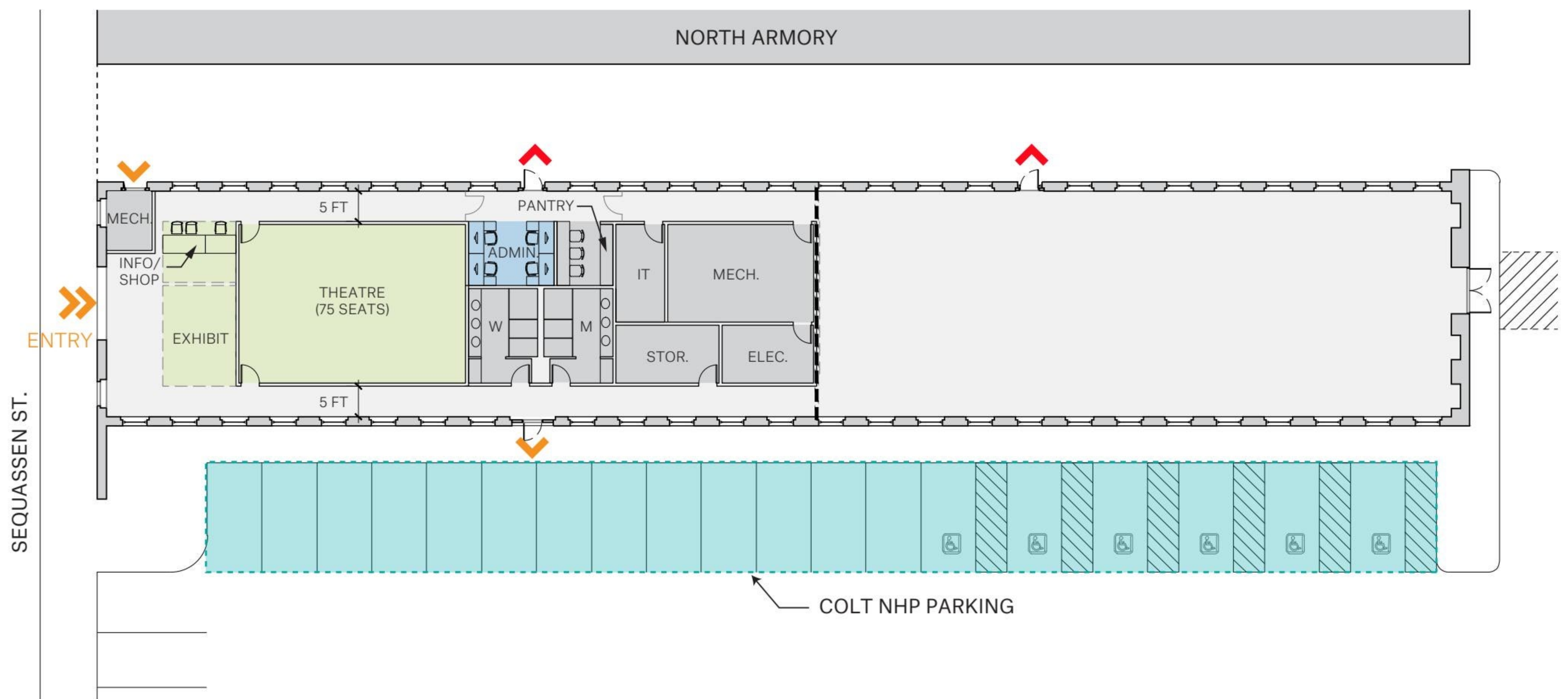
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6 APPENDIX



Interim-Term Development / Alt Option B



INTERIM TERM RECOMMENDATIONS (ALT OPTION B)

During the VBD meeting, alternate Option B was presented as a modest approach to the rehabilitation and occupancy of the buildings. This option follows the same planning principles as Option B and proposes:

1. **Stabilization / Historic Renovation of Building 8 & Building 10 Masonry Envelope**
(see short term recommendations for detail description of required work).
2. **Historic Restoration of Building 8 interior**
(see short term recommendations for detail description of required work).
3. **Partial Standard Fit-Out of Program**
including a 48 seat theatre, Information desk, gift shop, an open office for 4 staff members, and a pantry for NPS staff, restrooms and other support spaces.

The partial build allows project to move forward despite there being no guarantee of funding for a complete renovation of the two buildings. This option gives the Park the opportunity to occupy one of the structures. It also provides a public face for visitors, and allows the Park to operate while its exhibit content is developed. However, due to the minimal cost difference between full and partial build-out, Option B offered the best value at a capital cost only modestly above the lower importance options.

Agendas and Meeting Records / Kick-off Meeting

Agenda

Davis Brody Bond

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www.davisbrody.com

Date 10 January 2018
Time 9:30AM - 5:00 PM EST
Project name COLT Space Planning / Analysis / Programming / Misc.
Project number COLT 236702A
DBB Project No. 21715.AA
Subject COLT 236702A Space Planning Analysis - Kick off Meeting

DAY ONE - 01/10

9:30 am –11:00 am (approx.)

1. COLT Park Overview (*NPS COLT*)
 - a. History of the Park
 - b. Mission / Interpretive Goals of the Park
 - c. Site map
 - d. Visitor Use
 - e. Future Goals
2. Review of Existing structures (*NPS COLT*)
 - a. Historic preservation
 - b. Existing condition
 - c. Existing services and utilities
 - d. Existing technical documentation

11:00 am –1:30 am (approx.)

3. Site Walkthrough
 - a. Existing structure physical assessment
 - b. Survey and documentation

1:30 pm –2:30 pm – LUNCH

2:30 pm –5:00 pm (approx.)

- c. OPEN (Walkthrough continued and/or Departmental interviews).

Agenda

Davis Brody Bond

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www.davisbrody.com

Date 11 January 2018
Time 9:00AM - 4:00 PM EST
Project name COLT Space Planning / Analysis / Programming / Misc.
Project number COLT 236702A
DBB Project No. 21715.AA
Subject COLT 236702A Space Planning Analysis - Kick off Meeting

DAY TWO - 01/11

9:00 am –9:30 am (approx.)

1. Introduction
 - a. Team Introduction
 - b. Project Introduction: Scope of Services and Goals (**NPS COR**)
 - c. Architectural Team Introduction: Process (**Davis Brody Bond**)
 - d. Agenda Review: Meeting Goals and Objectives (**Davis Brody Bond**)

9:30 am –10:00 am (approx.)

2. COLT Park Overview (**NPS COLT**)
 - a. Mission / Interpretive Goals of the Park
 - b. Site map
 - c. Visitor Use
 - d. Future Goals

10:00 am –12:00 pm (approx.)

Departmental and Project Partners Discussion

Items to be discussed include:

3. Partnership among Preservation, Conservation, and Education Organizations & Project Program
(**DBB, all Park departmental representatives present**)
 - a. Current Operations / Program
 - b. Needs and Considerations
 - i. Staff / Departmental Functions & Operations
 - ii. Visitor Programmatic Functions & Operations
 - c. Immediate Facility Needs (1 – 5 Years)
 - d. Long Term Facility Needs (5+ Years)

12:00 pm –1:00 pm – LUNCH

1:00 pm –4:00 pm (approx.)

- a. OPEN (Walkthrough continued and/or Departmental interviews).

Meeting Record

Davis Brody Bond

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New York, NY 10004
tel +212 633 4700 / fax +212 633 4760
www.davisbrody.com

Date 11 January 2018

Project name COLT Space Planning / Analysis / Programming / Misc.

NPS Project number: COLT – 236702A

DBB Project number: 21715.AA

Subject COLT Kick-off Meeting Minutes

Present

National Park Service Denver Service Center (NPS)

Dan Dilworth, *NPS Northeast Region Project Manager*

National Park Service Coltsville National Historical Park (COLT) and/ or Springfield Armory NHS (SPAR)

James Woolsey, *COLT and SPAR Superintendent*

Andrew Long, *COLT and SPAR Management Assistant*

April May Preston, *Chief of Administration*

Keenan Comer, *COLT and SPAR Supervisory Facilities Operations Specialist*

Susan Ashman, *SPAR Park Ranger*

National Park Service Weir Farm National Historic Site

Linda Cook, *Superintendent*

Kevin Monthie, *Supervisory Facilities Operations Specialist*

Coltsville National Historical Park Partners

Donna Swarr, *Friends of Colt Park*

Victor Luna, *Friends of Colt Park*

Jack Hale, *Church of the Good Shephard*

William Hosley, *Terra Firma, Northeast*

Edd Russo, *Wadsworth Athenaeum*

Jana Colacino, *Connecticut Landmarks*

Carol Coburn, *Coltsville Heritage Alliance*

Jared Edwards, *State Review Board*

Melinda J. Schoen, *Armsmear*

Virginia Seeley, *Local Artists / Community Activist*

Kendall Wiggin, *Connecticut State Library*

Michael Zaleski, *Riverfront Recapture*

Ryan O'Hallorn, *Knox Foundation*

Dean Nelson, *Museum of Connecticut History*

Sheryl Hack, *Connecticut Landmarks*

Elliot Ginsburg, *Coltsville Heritage Alliance*

Sally Whipple, *Connecticut Old State House*

Rosangelica Rodriguez, *Trinity College Graduate Studies*

Conor Quinn, *Cong. Larson Office*

Consultants:

Mark Wagner, *Davis Brody Bond Architects*

Astry Duarte, *Davis Brody Bond Architects*

Meeting Record

COLT Space Planning / Analysis / Programming / Misc.

COLT Kick-off Meeting Minutes

01.11.2018

Page 2

DAY TWO

Coltsville National Historical Park - Coltsville Armory Partners Meeting

Dan Dilworth, NPS Northeast Region Project Manager, presented the projects scope and meeting goals to Coltsville National Historical Park staff and Partners. This was followed by an introduction to Davis Brody Bond by Mark Wagner and a presentation on the parks status by COLT superintendent James Woolsey.

Each member of the participating partner group shared with the A/E team their current and future work in Coltsville. The partners overall acknowledged the importance of sharing the cultural and historical significance of the factory and the park with visitor and the community. There is a need for a space that will serve as an orientation point for visitors and support the park and its partner's education and interpretative goals. The potential visitor center and education center should also enhance the collaborative relationship the park and its partners group. The group also recognized the need to create a memorable experience for the visitor and the challenges that will come with it. Below is brief summary of some of thoughts shared.

Knox Foundation

The Knox Foundation works on the conservation of urban environments, improving the communities and environment in Hartford by connecting its citizens to horticulture and rehabilitating young adults.

The foundation expressed interest in gathering spaces for its educational programs.

Riverfront Recapture

This non-profit organization is dedicated to protecting and maintaining the Riverfront and making it more accessible to the public. It also organizes cultural and recreational events along the banks of the Connecticut River

Connecticut Old State House

Their mission is to help CT become civically healthy through citizen engagement and civic awareness. The institution offers talks, workshops and lectures at where students can work on their civic skills.

Its focus as a partner of COLT NHP will be on broadening students' knowledge on the history of Coltsville.

Connecticut State Library

Its mission is to preserve the history and heritage of the state and make accessible to the public.

Meeting Record

COLT Space Planning / Analysis / Programming / Misc.

COLT Kick-off Meeting Minutes

01.11.2018

Page 2

DAY TWO

Coltsville National Historical Park - Coltsville Armory Partners Meeting

Dan Dilworth, NPS Northeast Region Project Manager, presented the projects scope and meeting goals to Coltsville National Historical Park staff and Partners. This was followed by an introduction to Davis Brody Bond by Mark Wagner and a presentation on the parks status by COLT superintendent James Woolsey.

Each member of the participating partner group shared with the A/E team their current and future work in Coltsville. The partners overall acknowledged the importance of sharing the cultural and historical significance of the factory and the park with visitor and the community. There is a need for a space that will serve as an orientation point for visitors and support the park and its partner's education and interpretative goals. The potential visitor center and education center should also enhance the collaborative relationship the park and its partners group. The group also recognized the need to create a memorable experience for the visitor and the challenges that will come with it. Below is brief summary of some of thoughts shared.

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Meeting Record

COLT Space Planning / Analysis / Programming / Misc.

COLT Kick-off Meeting Minutes

01.11.2018

Page 4

community resource. The two structures have flexible meeting spaces. They host community meetings for up to 100 people and outdoor festivals. Guided tours are given upon request.

Friends of COLT NHP

Advocacy group comprised of community members and local residents that work to preserve the park, share its history and cultural heritage. The group hosts small events that take place on the park including the Latino Fest. Currently their board meeting takes place at the Church of the Good Shephard and also some of their indoor events. They trying to establish a more pastoral experience.

Museum of Connecticut History

The museum's collections focuses on the government, military and industrial history of the state.

Coltsville Heritage Partnership

This partnership works with the NPS to protect the cultural and historical heritage of Coltsville. It is important to ensure Elizabeth and Sam Colt's history is told. Manufacturing was an important part of the Hartford's history and this should be shared with visitors.

The development of the Park will have some challenges including visitor flow. The points of interest in the park are relatively distant from one another and getting visitors to walk through the entire site will be difficult.

Springfield Armory NHS (SPAR)

Visitor Center in Springfield is a good case study for the future visitor center in COLT NHP.

Program requirements for the visitor center should include:

- Theatre or meeting area for an orientation film at park at least 125 people. It is important for the park to be able to share the history of the site with visitors.
- Blank range demonstration
- The Visitors center should be an extension of the factory. Visitors being able to access the dome in the East Armory should be considered in the planning of the visitor center and the redevelopment of buildings 08 and 10.

Submitted by: Astry Duarte and Mark Wagner

The foregoing constitutes the writer's understanding of the matters discussed and conclusions reached. If there are any corrections and comments, please notify DBB at your earliest convenience.

Meeting Attendance

Davis Brody Bond

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One New York Plaza, Suite 4200
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Date 11 January 2018
Time 9:00 AM – 12:00 PM
Project name Feasibility Study of Functions to Space as Planning/Programming/Analysis
And Concept Design Brief to Support COLT Programs
Project number COLT 236702A
DBB Project No. 21715.AA
Subject COLT 236702A - Space Planning / Analysis / Programming - Kick off Meeting

NAME	COMPANY
1 DONNA SWARR	FRIENDS OF COLT PARK
2 VICTOR Lina (Chair F.O.C.P.)	/ Director G.H. L.F.
3 Jack Hale	Church of the Good Shepherd
4 William Hosley	Cult. Res. Consultant
5 EDD RUSSO	WADSWORTH ATHENIUM
6 JANA COLACINO	CONNECTICUT LANDMARKS
7 DAN DILWORTH	National Park Service
8 Bernadette SILVERA	Coalition to strengthen the Sheldon Charlestown
9 CAROL COBURN	CHP-COLTSVILLE Heritage Partnership
10 JARED EDWARDS	RETRO FIA, CHAIR STATE DEVELOPMENT
11 Melinda Schoen	The Trustees of the Colt Bequest (Armory)
12 VIRGINIA SEELEY	RESIDENT, BOARD CHAIR, ARTIST
13 KENDALL WIGGIN	CT. STATE LIBRARY
14 LINDA COOK	National Park Service Weir Farm NHS
15 MICHAEL ZALESKI	RIVERFRONT RECAPTURE, INC.
16 Ryan O'Halloran	KNOX, Inc.
17 DEAN NELSON	MUSEUM OF CONNECTICUT HISTORY
18 Sheryl Hack	Connecticut Landmarks
19 Kevin Montano	Weir Farm Nat Hist. Site
20 JAMES WOOLSEY	Coltsville Nat Hist. Park
21 APRIL May Preston	COLTSVILLE NHP
22 KEENAN COMER	COLTSVILLE NHP
23 Andrew Laver	" "
24 Susan Ashman	Springfield Armory NHS
25 ELIOT Ginsburg	CHP - CHAIR
26 Sally Whipple	CHP Board & Exec Dir. Old State House
27 Rosangelica Rodriguez	Trinity College - Graduate Studies
28 Connor Quinn	Rep. Lujan's Office
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Programming Presentation

Agenda

Davis Brody Bond

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One New York Plaza, Suite 4200
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Date 7 June 2018
Time 9:00AM - 12:00 PM EST
Project name Feasibility Study of Functions to Space as Planning/Programming/Analysis
and Concept Design Brief to Support COLT Programs
Project number COLT 236702A
DBB Project No. 21715.AB
Subject COLT 236702A - Space Planning / Analysis / Programming - Programming Presentation

1. Colt Armory Buildings 8 & 10 / Existing Structures
2. Program Analysis
3. Colt Armory Buildings 8 & 10 / Adaptive Re-Use
4. Park Planning Principles

Meeting Attendance

Davis Brody Bond

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One New York Plaza, Suite 4200
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www.davisbrody.com

Date 06 June 2018
Time 9:00 AM – 12:00 PM
Project name Feasibility Study of Functions to Space as Planning/Programming/Analysis
And Concept Design Brief to Support COLT Programs
Project number COLT 236702A
DBB Project No. 21715.AA
Subject COLT 236702A - Space Planning / Analysis / Programming Presentation

	NAME	COMPANY
1	ANDREW LONGA	SPAR/COLT NPS
2	AMY GLOWACKI	SPAR/COLT NPS
3	APRIL MAY PRESTON	SPAR/COLT/SABA/MARILISE NPS
4	KEENAN COMER	SPAR/COLT NPS
5	JAMES WOOLSEY	SPAR/COLT NPS
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Meeting Attendance

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Date 07 June 2018
Time 9:00 AM – 12:00 PM
Project name Feasibility Study of Functions to Space as Planning/Programming/Analysis
And Concept Design Brief to Support COLT Programs
Project number COLT 236702A
DBB Project No. 21715.AA
Subject COLT 236702A - Space Planning / Analysis / Programming Presentation

NAME	COMPANY
1 Jack Hale	Church of the Good Shepherd
2 Amy G. L. Wacker	COLT/SPAR NPS
3 Andrew Lover	COLT/SPAR NPS
4 Carol Coburn	Coltsville Heritage Partnership
5 James Woolsey	Coltsville NHP
6 Kevin Menthie	Weir Farm National Historic Site
7 Sheryl Hacks	CT Landmarks
8 Linda Cook	Weir Farm NPS
9 April May Preston	SPAR/COLT/MABI/SAGA/ST
10 JANA COLACINO	CONNECTICUT LANDMARKS
11 Conor Quinn	Rep. John Larson's Office
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Value-Based Decision Session

Agenda

Davis Brody Bond

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New York, NY 10004
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Date 17 July 2018
Time 9:00AM - 12:00 PM EST
Project name Feasibility Study of Functions to Space as Planning/Programming/Analysis
and Concept Design Brief to Support COLT Programs
Project number COLT 236702A
DBB Project No. 21715.AA
Subject COLT 236702A - Space Planning / Analysis / VBD Presentation

9:00 am –10:00 am (approx.)

1. Value Analysis Presentation (DBB)
 - a. Program Analysis Recap
2. Colt Armory Buildings 8 & 10 Adaptive Re-Use
 - i. Strategies and Goals
 - ii. Planning Approach

10:00 am –12:00 am (approx.)

3. VA and CBA Effort (agenda prepared by F&G)

Coltsville National Historical Park (COLT)
Coltsville Armory Buildings 8 & 10 Space Planning,
Analysis and Programming Study

Mini Value Analysis/CBA Workshop Agenda

Information & Function Analysis Phase

Project designers will bring the VA Team up to date on project issues and status and present the alternatives to be considered in the workshop. The owner's value objectives will be clarified. VA Team Leader will present Draft FAST Diagram to clarify the functional objectives of the project. The VA Team will discuss the factors and sub-factors to be used in the Choosing by Advantages (CBA) process, identifying and defining them as required.

8:45 AM	9:00 AM	VA workshop participants check in
9:00 AM	9:10 AM	Introductions and Opening Remarks
9:10 AM	9:40 AM	Designer's Presentation of Options
9:40 AM	10:00 AM	Function Analysis

Creative Phase

A creative session will be conducted to list as many additional ideas as possible for consideration. The team will focus on refinements to the current alternatives that can maintain or improve necessary functions while reducing cost or limiting additional costs to an acceptable amount.

10:00 AM	10:30 AM	Creative/Brainstorming Session
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Evaluation Phase

The VA team will evaluate the potential refinements to current alternatives as documented in the disposition column of the alternative table. Selected refinements will be incorporated into the alternatives under consideration.

10:30 AM	10:45 AM	Select Creative Ideas for Incorporation
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Recommendation Phase

The VA Team will compare refined alternatives to each other using CBA to identify the recommended alternative.

10:45 AM	11:00 AM	Factor and Sub-Factor Review and Discussion
11:00 AM	11:50 AM	Compare Alternatives via Choosing by Advantages
11:50 AM	12:00 PM	Final Discussions and Recommendations
12:00 PM		Adjourn Mini-VA/CBA Workshop

Meeting Attendance

Davis Brody Bond

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Date 17 July 2018
Time 9:00 AM – 12:00 PM
Project name Feasibility Study of Functions to Space as Planning/Programming/Analysis
And Concept Design Brief to Support COLT Programs
Project number COLT 236702A
DBB Project No. 21715.AA
Subject COLT 236702A - Space Planning / Analysis / VBD Presentation

NAME	COMPANY
1 Jack Hale	Church of the Good Shepherd
2 Carol Coburn	Coltsville Heritage Partnership
3 Kendall Wiggins	CT STATE LIBRARY
4 Melinda Schoen	Armstrong (The Trustees of the Colt Bequest)
5 CATLIN PALMER	CITY OF HARTFORD
6 DEAN NELSON	MUSEUM OF CONNECTICUT HISTORY
7 FRED RUSSO	WATSWORTH ATTORNEY
8 Andrew Long	NPS
9 Jim Brown	NPS
10 Larry Turk	NPS
11 Conor Quinn	Ken Larson
12 James Woolsey	NPS
13 KEENAN COMER	NPS
14 LARRY DOOLEY	COLT GATEWAY
15 MARY FALVEY	HARTFORD PRESERVATION ALLIANCE
16 KEITH H. FARRAR	NPS
17 Amy Glowacki	NPS COLT/SPAR
18 JANA COLACINO	CONNECTICUT LANDMARKS
19 MICHAEL ZALESKI	RIVERFRONT RECAPTURE
20 JEAN MITCHELL	ARMSTRONG RESIDENT
21 Jackie Mandych	Quilt Partnership
22 MARY PELLETIER	PARK WATERSHED
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Questionnaires

Davis Brody Bond

COLTSVILLE NATIONAL HISTORICAL PARK
PROGRAMMING QUESTIONNAIRE – PARK STAFF

DATE: "[Click here and type date]"

ISSUED BY: "[Click here and type Name]"

CONTACT INFO: "[Click here and type Contact Info]"

Background Information

Division Name:			
Supervisor:			
Primary Work Location:		Avg. Usage Per Week:	
Secondary Work Location:		Avg. Usage Per Week:	

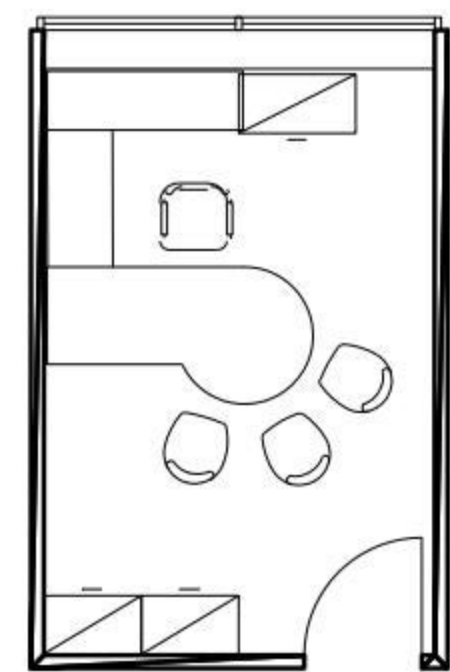
1. Department Function/Organization

- a. What is the general function and objective of your department?
- b. What is the typical work schedule both in low and peak season for your group?
- c. What is the typical work schedule both in low and peak season for your group?

2. Personnel

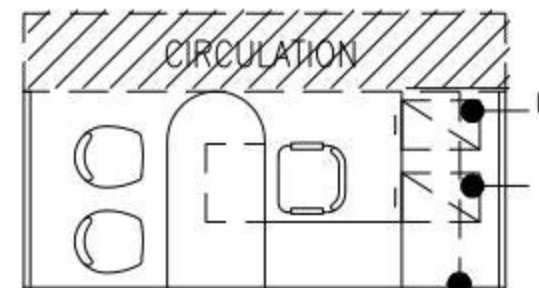
Please indicate your workspace type (private office or workstation/cubicle) and your office equipment requirements.

PRIVATE OFFICE TYPE A
10'-0"x15'-0" 150 S.F.



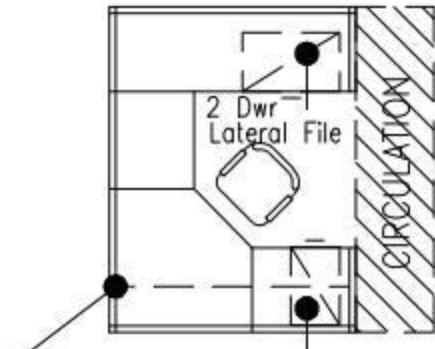
PO A

WORKSTATION TYPE B
6'-0"x12'-0"+C 104 S.F.



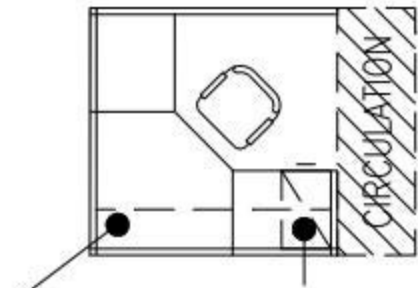
WS B

WORKSTATION TYPE C
6'-0"x8'-0"+C 64 S.F.



WS C

WORKSTATION TYPE D
6'-0"x6'-0"+C 48 S.F.



WS D

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Davis Brody Bond

COLTSVILLE NATIONAL HISTORICAL PARK PROGRAMMING QUESTIONNAIRE – PARK STAFF

Work Space Requirements Worksheet

Department:

Current Location:

Personnel: Current and Projected Staff

Position / Title	Current (C) / Future (F)	Primary Location	Avg. Usage Per Week	Secondary Location	Avg. Usage Per Week	Workspace Type	Equipment Type

**** Equipment Type refers to that dedicated to a particular individual. Examples:**

PC = Computer Terminal P = Printer F = Fax

LT = Lap Top Computer O = Other (please describe)

3. Physical Space Requirements

Communal Spaces Requirements Worksheet

Of the following spaces, please provide the following requirements for the spaces listed below.

Essential (E) or Preferred (P) – essential spaces are considered critical for

Quantity – Staff members / visitors expected to occupy the space.

Frequency of use – Average times per week your group would be occupying the space.

	Essential (E)/ Preferred (P)	QTY	Avg. Usage Per Week	Remarks
Communal Spaces				
Classrooms				
Meeting Room				
Theatre				
Exhibition				
Library / Archiving				
Leased Space (Café / Retail)				

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Davis Brody Bond

COLTSVILLE NATIONAL HISTORICAL PARK
PROGRAMMING QUESTIONNAIRE – PARK STAFF

Conference Room Requirements

- a. Indicate below the number and use of conference rooms that may be required for your group. Please indicate if these spaces may be shared with other groups or partners.

No. of People (Min./Max)	Avg. Usage Per Week	Shared (S) / Private (P)	Remarks

- b. What audio-visual capabilities are required in the conference rooms?

4. Support Space, Special Equipment/Room Requirements

List support spaces which are or may be used by your group. Indicate the spaces that may be shared with other groups or partners. Please list your present and forecast requirements for special equipment in the remarks columns.

Special Use Space	Approximate Area	Shared (S) / Private (P)	Remarks
Copy Rooms			
Storage Rooms			
Workrooms			
Counseling Rooms			
Locker Rooms			
Others:			
Others:			

5. Files & Storage Space Requirements

Provide a list of your present and forecast file and storage space requirements. List all filing or miscellaneous storage requirements that belong in open areas or enclosed rooms.

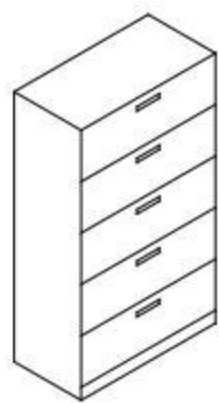
Files & Storage

DESCRIPTION	Req.d Area	QUANTITY		
		Current	Future	Notes
5-Drawer Lateral File Cabinets				
4-Drawer Lateral File Cabinets				
3-Drawer Lateral File Cabinets				
2-Drawer Lateral File Cabinets				
Lateral Overhead file Cabinets				

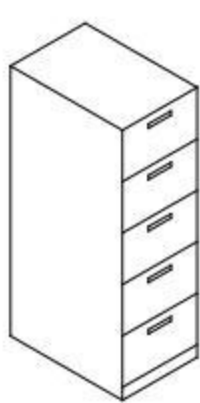
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One New York Plaza, Suite 4200, New York, NY 10004
Tel +212.633.4700

5-Drawer Vertical File Cabinets			
4-Drawer Vertical File Cabinets			
3-Drawer Vertical File Cabinets			
2-Drawer Vertical File Cabinets			
Vertical Overhead file Cabinets			
Card Files			
Storage Cabinet, 18" Deep			
Storage Cabinet, 24" Deep			
Bookcases			
Metal Shelving Unit			
Other:			
Other:			
Other:			

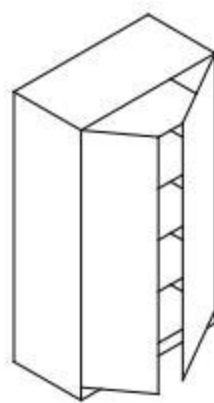
Examples:



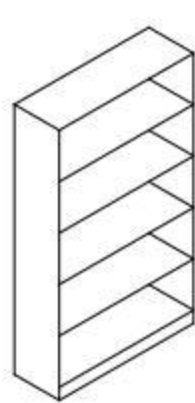
LATERAL
FILE



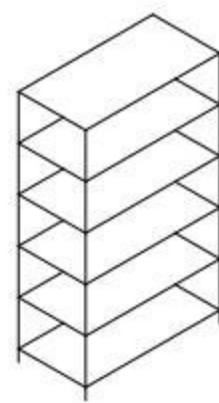
VERTICAL
FILE



STORAGE
CABINET



BOOKCASE



SHELVING
UNIT

6. Building Environment/Security Requirements

- a. Does your group require any special building environment conditions, such as special lighting, air conditioning or security?

7. Adjacency Requirements

The aim of this section is to obtain adjacency requirements for your group. Adjacencies are the physical needs of one group to be close to or separate from other groups. In the space provided below, please list groups and/or functions your department has adjacency requirements for. We ask that you indicate your requirements using the following three classifications:

Essential - critical workflow or direct communication, must be directly next to your group.

Important - should be in close proximity, probably on the same floor

Normal - probably not more than one or two floors apart.

Undesirable - should be physically separated from this group either by means of distance or physical barriers.

Essential

Group Name	Where are they currently located?

Davis Brody Bond

COLTSVILLE NATIONAL HISTORICAL PARK
PROGRAMMING QUESTIONNAIRE – PARK STAFF

<u>Important</u>	Group Name	Where are they currently located?
<u>Normal</u>	Group Name	Where are they currently located?
<u>Undesirable</u>	Group Name	Where are they currently located?

9. Other Thoughts
- List...

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COLTSVILLE NATIONAL HISTORICAL PARK PROGRAMMING QUESTIONNAIRE – PARTNERS

DATE: "[Click here and type date]"

ISSUED BY: "[Click here and type Name]"

CONTACT INFO: "[Click here and type Contact Info]"

Background Information

Organization:

**Present Location(s)
Building Address:**

Objectives

1. What are the long term (5 years) objectives of your organization with COLT NHP?
2. What are the primary obstacles that your organization faces in achieving these objectives at the Park?

Organization/Operations

3. Please provide a brief description of your organization's following desired public-facing operations/ programs at the Park (e.g. site tours, blank range demonstrations, lectures, exhibits, etc.):
 - a. Indoor Program Description
 - b. Outdoor Program Description
4. Please provide a brief description of your organization's non-public operations within the Park (e.g. community meetings, research, training, etc.)
 - a. Indoor Program Description
 - b. Outdoor Program Description
5. How often would these programs take place? What would the hours of operation be for your group?
6. Will any staff members from your organization assist COLT NHP in managing or operating the proposed programs mentioned above? If so please provide the quantity of staff members.
7. How many visitors would you anticipate taking part in your program during low and peak seasons?

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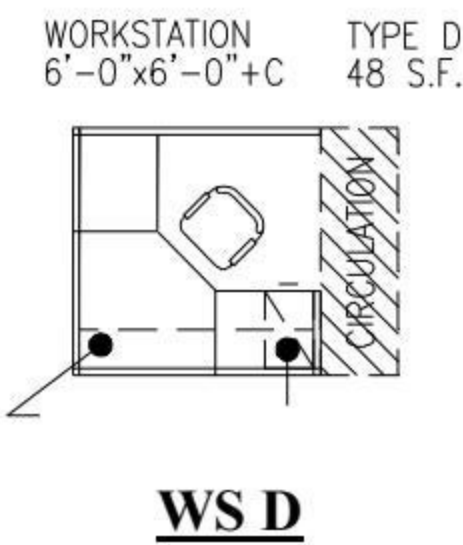
COLTSVILLE NATIONALHISTORICAL PARK
PROGRAMMING QUESTIONNAIRE – PARTNERS

Physical Space

In addition to an understanding of Partnership goals, operations and programing this current planning study will attempt to identify the “wish list” of desired physical onsite space. Our analysis will attempt to find common types of space for planning purposes. We will then study several options in which these types of spaces can potentially be accommodated. This study is for cost and budget study.

8. Short term/ Temporary Administrative Needs

The planning study will be considering the feasibility of shared workspaces or “hoteling stations” for any temporary administrative and/ or research needs. These stations will allow Park personnel or partners to schedule their use of workspaces instead of having permanently assigned seating. (See image below)
If needed, please list the following requirements for temporary administrative space.



Temporary Work Space Requirements Worksheet

Position / Title	Avg. Usage Per Week	Equipment Type

9. Shared / Communal Spaces Requirements Worksheet

Of the following spaces, please provide the following requirements.

Essential (E) or Preferred (P) – essential spaces are considered critical for achieving your organizations goals at the park.

Quantity – Visitors expected to occupy the space.

Frequency of use – Average times per week your group would be occupying the space.

Desired Program – Please provide a brief description of the desired use for the space (e.g. Meeting room for weekly community meetings, classrooms for monthly training classes, etc.)

	Essential (E)/ Preferred (P)	QTY	Avg. Usage Per Week	Desired Program
Communal Spaces				
Classrooms				
Meeting Rooms				
Exhibition				
Theatre				

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10. If not listed above, please list any other spaces that will help your organization achieve its goal at the park.

11. What audio-visual capabilities are needed / required in the communal spaces?

12. Does your group require any special building environment conditions, such as special lighting, air conditioning or security?

Other Thoughts

- List...

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