

Boston's Arnold Arboretum: A Place for Study and Recreation

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(Olmstead NHS)

By the mid-to-late 19th century, the crushing density of increasingly crowded cities led to the view that parks and public gardens could serve as antidotes to the urban environment. Renowned landscape architect Frederick Law Olmsted believed that visiting oases of green space could help ease the pressures of urban life for both the poor and the rich. In response to Olmsted's Central Park in New York, the first large public space set aside for recreational use in an American city, cities such as Philadelphia and Boston began planning their own green spaces. In Boston, Olmsted designed a series of parks linked by parkways collectively known as the "Emerald Necklace."

The Arnold Arboretum, one of the "jewels" of Boston's Emerald Necklace, has served as a tranquil haven since it opened to the public in the 1880s. There, seasons come alive in vibrant colors. In the spring, the delicate perfume of lilac, mock orange, and viburnum float on soft breezes. The pale green leaves of hickory, walnut, and hackberry trees offer verdant canopies. By mid-summer, the Arnold Arboretum is ablaze with color and heavy with ripening nuts and fruit. In the fall, rich autumn colors catch the sunlight. Even winter is beautiful in the arboretum. The trees and shrubs stand in stark contrast to gray skies and snow-covered slopes.

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Where this lesson fits into the curriculum

Time Period: Late 19th century

Topics: The lesson can be used in teaching units on late 19th-century urban expansion, especially as influenced by immigration and the Industrial Revolution. It also could form the core of an interdisciplinary unit when used in conjunction with lessons on the Romantic and Transcendentalist movements and lessons on botany.

Relevant United States History Standards for Grades 5-12

This lesson relates to the following National Standards for History from the UCLA National Center for History in the Schools:

US History Era 6

- **Standard 1B:** The student understands the rapid growth of cities and how urban life changed.
- **Standard 1D:** The student understands the effects of rapid industrialization on the environment and the emergence of the first conservation movement.

Relevant Curriculum Standards for Social Studies

This lesson relates to the following Curriculum Standards for Social Studies from the National Council for the Social Studies:

Theme III: People, Places, and Environment

- Standard G The student describes how people create places that reflect cultural values and ideals as they build neighborhoods, parks, shopping centers, and the like.
- Standard H The student examines, interprets, and analyzes physical and cultural patterns and their interactions, such as land use, settlement patterns, cultural transmission of customs and ideas, and ecosystem changes.
- Standard K The student proposes, compares, and evaluates alternative uses of land and resources in communities, regions, nations, and the world.



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Theme V: Individuals, Groups, and Institutions

• Standard G - The student applies knowledge of how groups and institutions work to meet individual needs and promote the common good.

Theme VIII: Science, Technology, and Society

 Standard B - The student shows through specific examples how science and technology have changed people's perceptions of the social and natural world, such as in their relationships to the land, animal life, family life, and economic needs, wants and security.

Theme X: Civic Ideals, and Practices

- Standard F The student identifies and explains the roles of formal and informal political actors in influencing and shaping public policy and decision-making.
- Standard J The student examines strategies designed to strengthen the "common good," which consider a range of options for citizen action.

Relevant Common Core Standards

This lesson relates to the following Common Core English and Language Arts Standards for History and Social Studies for middle and high school students:

Key Ideas and Details

- CCSS.ELA-Literacy.RH.6-12.1
- CCSS.ELA-Literacy.RH.6-12.2

Craft and Structure

- CCSS.ELA-Literacy.RH.6-12.4
- CCSS.ELA-Literacy.RH.6-12.6

Integration of Knowledge and Ideas

- CCSS.ELA-Literacy.RH.6-12.7
- CCSS.ELA-Literacy.RH.6-12.8

Range of Reading and Level of Text Complexity

• CCSS.ELA-Literacy.RH.6-12.10



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About This Lesson

This lesson is based on the National Register of Historic Places registration file for the "Arnold Arboretum" [http://pdfhost.focus.nps.gov/docs/NHLS/Text/66000127.pdf] (with photographs [http://pdfhost.focus.nps.gov/docs/NHLS/Photos/66000127.pdf]) and other source material about the arboretum and Frederick Law Olmsted. *Arnold Arboretum* was written by Alan Banks, Park Ranger at Frederick Law Olmsted National Historic Site. It was published in 2001. It was edited by Fay Metcalf, education consultant, and the Teaching with Historic Places staff. The lesson was developed as a cooperative effort between the park and Arnold Arboretum of Harvard University. TwHP is sponsored, in part, by the Cultural Resources Training Initiative and Parks as Classrooms programs of the National Park Service. This lesson is one in a series that brings the important stories of historic places into the classrooms across the country.

Objectives

- **1.** To consider how 19th-century urban conditions influenced the development and design of parks;
- 2. To examine the history of the Arnold Arboretum and its role in the Boston park system;
- **3.** To gain a better understanding of Frederick Law Olmsted and Charles Sprague Sargent, the two men responsible for the Arnold Arboretum;
- **4.** To conduct research about the history of planned parks in their own community.

Materials for students

The materials listed below can either be used directly on the computer or can be printed out, photocopied, and distributed to students.

- 1. One map of the Boston Park System;
- 2. Three readings about the establishment of Arnold Arboretum;
- **3.** One drawing & two photos of the arboretum and its construction.

Visiting the site

The Arnold Arboretum is located in Jamaica Plain, a neighborhood of Boston, Massachusetts. The main gate is located on the Arborway, 100 yards south of the intersection of Route 1 and 203. The grounds are open to the public every day from dawn dusk. For more information, contact the Arnold Arboretum, 125 The Arborway, Jamaica Plain, MA 02130, or visit the website. To find out more about Frederick Law Olmsted, contact the Superintendent, Frederick Law Olmsted National Historic Site (the

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or <u>visit the park's</u>	ncy for the Arnold A website.		

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Getting Started



Where and when might this photo have been taken?

Photo Analysis Worksheet

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Step 1: Examine the photograph for 10 seconds. How would you describe the photograph?
Step 2: Divide the photograph into quadrants and study each section individually. What detailssuch as people, objects, activitiesdo you notice?
Step 3: What other informationsuch as time period, location, season, reason photo was takencan you gather from the photo?
Step 4: How would you revise your first description of the photo using the information noted in Steps 2 and 3?
Step 5: What questions do you have about the photograph? How might you find answers to these questions?

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Setting the Stage

In the mid-19th century many urban centers saw their population double within a few decades, mostly through a huge influx of European immigrants. The cities were ill prepared to absorb such large numbers. Without a proper sanitation system to handle trash and human waste, epidemics raged unchecked. Mental health suffered as groups of people, many from agrarian cultures, tried to adjust to these new conditions.

Frederick Law Olmsted (1822-1903), widely recognized as America's premier landscape architect, believed that overcrowding in cities made people nervous and wary of one another as well as susceptible to disease. He suggested that while many people may have had to live in claustrophobic urban neighborhoods, planned parks and open spaces could serve as a respite by providing beautiful, tranquil, and healthy environments. He felt that parks would improve the health, disposition, and morals of city dwellers, and in particular, the poor and the sickly.

These views, steeped in the Romantic and Transcendental beliefs that nature was a necessary element in psychological and physical survival, were first fully realized in the United States between 1857 and 1863. Olmsted and his partner, architect Calvert Vaux, designed and oversaw construction of New York's 800-acre Central Park, the first large open urban space set aside for recreational use. Central Park served as the catalyst for other parks in cities such as Baltimore, Philadelphia, and Boston. In the 1870s, the City of Boston hired Olmsted, whose expertise was much in demand at the time, to develop plans for a park system.

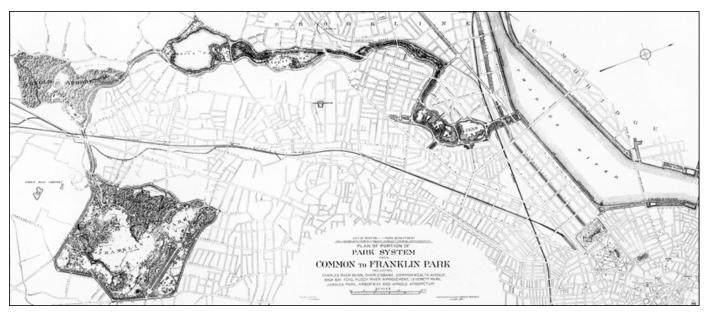
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Locating the Site

Map 1: Plan of Boston Park System, 1894



(National Park Service)

Olmsted's plan for Boston's park system, known as the "Emerald Necklace," consists of several small parks that are linked by tree-lined roads called parkways. This concept of separate but connected parks provided a way to link newly-added areas to the traditional city center while providing several forms of recreation for area inhabitants such as pleasure driving, picnicking, and hiking. The Arnold Arboretum, the first arboretum in the United States, makes a unique contribution to the system as a place for the study of trees as well as recreation.



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Questions for Map 1
1) Why do you think the system is known as the Emerald Necklace?
2) What would be some of the advantages and disadvantages of having a seven-mile long series of parks rather than one large park as was done in other cities?
3) Note the relationship of Arnold Arboretum (upper left corner) to the rest of the parks in terms of size and position.

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Determining the Facts

Reading 1: The Establishment of Arnold Arboretum

The Arnold Arboretum, among the "jewels" of Boston's Emerald Necklace, was the first arboretum in the United States. The catalyst for establishing an arboretum, a place for the scientific study and exhibition of trees, was the death of James Arnold, a successful Massachusetts merchant. Arnold had bequeathed \$100,000 upon his death in 1868 for study and research in either agriculture (raising crops and livestock) or horticulture (raising flowers, fruits, vegetables, or ornamental plants). The trustees of his estate decided to use the money to establish a place for the study of woody plants: trees, shrubs, and vines. The land eventually used was the former farm of Benjamin Bussey. Bussey had willed his land to Harvard University. In March 1872, the trustees presented Arnold's gift to Harvard University. A few months later, the Bussey land and the Arnold trust were merged to create the Arnold Arboretum. Shortly thereafter they appointed Charles Sprague Sargent as its director.

Charles Sargent was born in 1841 into an elite Boston family. His father was a successful merchant and banker as well as an amateur horticulturist. Among Charles Sargent's well-known relatives was a Chief Justice of the Supreme Court of Massachusetts, the painter John Singer Sargent, and his father's cousin Henry Winthrop Sargent. Henry Sargent, friend and patron of landscape gardener Alexander Jackson Downing, would be an early inspiration to Charles Sargent and pique his interest in horticulture. After graduating from Harvard in 1862, Sargent served in the Civil War and then spent three years traveling through Europe. Upon his return in 1868, he took over management of his father's large estate and soon began a lifelong interest in trees, shrubs, and ornamental plants. In May 1872, he became Professor of Horticulture at the Bussey Institute, an extension site of Harvard. Sargent's appointment as Arnold Arboretum's first director later that year placed him in contact with some of the most influential scientists of his time.

It was decided that Arnold Arboretum should display every kind of tree that successfully could be grown in the Boston area (the North Temperate Zone). In the half-century before the establishment of Arnold Arboretum, the science of botany, and particularly taxonomy (the theory, principles, and process of classifying living things), grew tremendously.¹ By the early 19th century, a new "natural" system of classification based on the development of form and structure slowly replaced the Linnaean system, which involved placing trees into categories according to their number of male and female plant parts. Sargent faced the challenge of planting trees in a way that reflected these advances, while still arranging them to look as natural as possible.

Sargent later said that no one, including himself, realized the difficulties involved in establishing the arboretum. He began "without equipment or the support and encouragement of the general public which then knew nothing about an Arboretum and what it was expected to accomplish."² After determining that he did not have the funds necessary to establish and maintain a proper facility, he turned to Frederick Law Olmsted for help. In June 1874, Sargent wrote to Olmsted, proposing that the City of Boston might provide the needed money for the arboretum. The following year, the City of Boston created a Park Commission and eventually hired Frederick Law Olmsted to prepare studies for a park plan. Sargent, along with Olmsted in his new position

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as park planner, joined forces in a campaign to secure funding for the arboretum by including it in the plans for Boston's park system.

For several years, Olmsted and Sargent worked together to convince the City of Boston and Harvard University's officers to agree to work together to establish the arboretum. Sargent and Olmsted appeared before committees, wrote articles, and persuaded influential citizens to support the project. Finally, on December 30, 1882, Harvard and the City signed an agreement under which the City of Boston received the title to the land intended for the arboretum and then leased it back to Harvard, for an annual fee of one dollar. The City agreed to install and maintain walkways and drives according to Olmsted's design and provide police protection. Harvard would create and maintain the scientific collection of plants and agreed that the arboretum would become part of Boston's park system and would be open to the public rather than used solely as a place of study. After more than nine years as Director, Sargent was at last free to proceed with the project. The long negotiations did prove beneficial in one respect; Sargent had time not only to educate the public as to what an arboretum was, but to win their support.

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3	oston's Arnold Arboretum: A Place for Study and Recreation	E.
	Questions for Reading 1	
	1) What is an arboretum?	
	2) Why did Sargent want to involve the City of Boston in the arboretum project?	
	3) Why do you think Sargent thought it would be beneficial to have Olmsted's support for the	
	arboretum project?	
	4) What agreement did Harvard and the City of Boston finally reach?	

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Determining the Facts

Reading 2: Olmsted's Views on Parks

Frederick Law Olmsted is best known as the founder of American landscape architecture. The office he established over a century ago created designs for thousands of public and private projects from coast to coast. His works include Central Park in New York, Belle Isle Park in Detroit, the grounds of Stanford University in California, the Biltmore Estate in North Carolina, and the U.S. Capitol, as well as the Boston park system. In every case, he looked at nature as something to be experienced rather than just talked about. His great genius was in arranging and rearranging nature so that every view seemed perfectly natural.

Born in Connecticut in 1822, Olmsted was about 20 years older than Charles Sargent. Sumac poisoning at the age of 14 affected his eyesight and allowed him little formal schooling. He did study on his own, however, and during a trip to Europe he became interested in English landscape gardening, which had moved away from the rigidity of formal gardens toward a more romantic, natural look. Olmsted also became fascinated with the idea of parks as ideal places in which people could experience the essence of nature. His writings on the value of natural scenery share similarities with those of William Wordsworth (1770-1850) and Ralph Waldo Emerson (1803-1882), major literary figures of the period associated with the Romantic and Transcendentalist movements respectively. These movements, popular during the second quarter of the 19th century, stressed the importance of man's unity with nature.

Rather than dismissing cities as terrible places in which to live, Olmsted thought that cities could be wonderful if they incorporated places of natural beauty where people could enjoy the healthful benefits of sunlight and pure air. In such places, people could interact in ways that might ease the stress and antisocial behavior he attributed to the crowded city. He expressed these views in his address, "Public Parks and the Enlargement of Towns," which he gave in Boston in 1870. He proposed that all cities set aside space for parks that could be used to experience natural scenery. He also felt that:

The park should, as far as possible, complement the town. Openness is the one thing you cannot get in buildings. Picturesqueness you can get. Let your buildings be as picturesque as your artists can make them. This is the beauty of the town. Consequently, the beauty of the park should be the other. It should be the beauty of the fields, the meadow, the prairie, or green pastures, and the still waters. What we want to gain is tranquility and rest to the mind.¹

To Olmsted, the function of the park was to relax the human spirit. By offering a physical and visual contrast with the city, parks produced an involuntary response in the visitor. He said, "The chief end of a large park is an effect on the human organism...like that of music...a kind that goes back of thought, and cannot be fully given the form of words."²

Olmsted was very strict in his interpretation of what did and did not constitute a park. He believed that even though other landscapes, such as public squares or botanical gardens, may contain similar elements of trees, water, fields, and roads, the idea behind the design of a park was often quite different. Olmsted realized that there surely would be differences of opinion with

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Sargent over how an arboretum should be designed. Responding to Sargent's letter asking him to become involved in the project, he wrote:

Indeed a park and an arboretum seem so far unlike in purpose that I do not feel sure that I could combine them satisfactorily. I certainly would not undertake to do so in this case without your cooperation and I think it would be better and more proper that the plan should be made by you with my aid rather than by me with yours.³

It is clear that Olmsted worried that the idea of an arboretum serving as a park might not work at all. However, he soon embraced the arboretum project because it sought to bring the beauty of nature to the city. Olmsted worked diligently for many years to see it come to fruition.



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Questions for Reading 2

1) How were Olmsted's views related to Transcendentalist and Romantic thought?
2) What did Olmsted believe the beauty of a park provided to people? Can you think of a place in your town that gives you the feeling he described?
3) What do you think Olmsted meant by "picturesqueness"? Can you give an example of a picturesque place?
4) Olmsted compared the effect of a park to that of music. What do you think he meant? Do you listen to music for the same reasons that you might go to a public park?

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Determining the Facts

Reading 3: Arnold Arboretum Becomes a Reality

The establishment of Arnold Arboretum in 1872 marked the first time in this country that provisions were made to collect trees from all over the world and plant them in one area. Charles Sargent had many questions to address about the fundamental purpose, layout, and use of an arboretum before he could begin planting his specimens. These questions were answered only through years of collaboration between Sargent and Olmsted. Both men agreed that people should be able to study the trees not just as scientific specimens, but as living works of art. To fulfill its purposes as an arboretum, the trees needed to be grouped by family and genus according to the natural order. To make the arboretum useful as a park, they had to design the roads in a way that suggested relaxation. The route had to curve gently to and fro through the landscape, always leading visitors to new scenery. The trees, therefore, could not be planted in the stiff and formal lines of a conventional botanical garden.

Months went by, then years, as Olmsted attempted to merge the concept of a park and a tree museum into a mutually agreeable plan. He produced drawing after drawing showing in what order the trees could be planted and where roads could be built. Sargent stated, "Olmsted of course will render immense assistance in the way of taste and engineering, but the arrangement of plants so that they will tell as clearly as possible the story they are meant to illustrate I must do." Sargent insisted that many species be planted along the roads by type, to allow people to compare their differences and similarities. He wanted visitors to be able to examine side by side a maple from Maine and one from Japan. Olmsted wanted the trees to appear as they would have in nature, in clumps with plenty of curving space between groups. Discussions between the two men seemed endless, but if a design was not decided upon quickly, the trees that Sargent already had collected would be too large to plant.

Six months after Harvard and Boston signed their agreement, the city began constructing the arboretum's drives, a process which took 10 years to complete. In late 1884, Sargent and Olmsted worked on refining the planting plan. Rather than containing every tree and shrub that could grow in the climate of Boston, the arboretum would now feature a selection of North American and foreign trees to show tree growth in the North Temperate Zone. In 1885, Olmsted and Sargent finally agreed on a final planting plan. The installation of the permanent tree collection began in the spring of 1886 as beeches, ashes, elms, and hickories were transferred from the nursery beds where they had been kept. By spring of 1887, 120,000 trees and shrubs were in place.

Sargent realized his dreams as thousands of trees from all over the world passed through the arboretum's gates. He and his staff had traveled in search of woody plants throughout the U.S., Europe, and the Far East. They brought back plants such as Japanese wisteria, Chinese dogwoods, and ginkgoes--trees that form a tall canopy of yellow, fan--shaped leaves. He made sure all were planted just right so they would grow to be healthy examples of their species. He remarked, "Trees have never been planted with better promise of undisturbed old age."²

Olmsted also achieved a dream. For those who walk through Arnold Arboretum's grounds, the undulating design of the roads and the planting areas yields one visual delight after another. The final product was a testament to "Olmsted's artistry and Sargent's good taste." Together

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Olmsted and Sargent created a place of beauty and science. Its form and function were woven together like a fine tapestry.

Certainly, Arnold Arboretum did not erase the urban problems of congestion, epidemics, and unsanitary conditions in Boston. However, it did provide a tranquil diversion from the crowded city. It offered a place for families to take weekend walks among spring flowers or fall foliage, for amateur horticulturists to keep up with the latest developments, and for professional landscape designers and botanists to examine hundreds of trees and shrubs previously unknown in the United States. Reflecting on the first 50 years of the arboretum's existence, Sargent wrote:

...[I]t has been managed not merely as a New England museum but as a national and international institution working to increase knowledge of trees in all parts of the world.... An institution with such ambitions must be equipped to answer any question about any tree growing in any part of the world which may be addressed to it.⁴

Today, Arnold Arboretum contains more than 6,000 varieties of trees and shrubs, with 1,286 of them grown for the first time in Northeast America. Many of the species Sargent set out at the Arnold Arboretum are now grown in other parts of the nation, enriching private gardens and public parks across the country.

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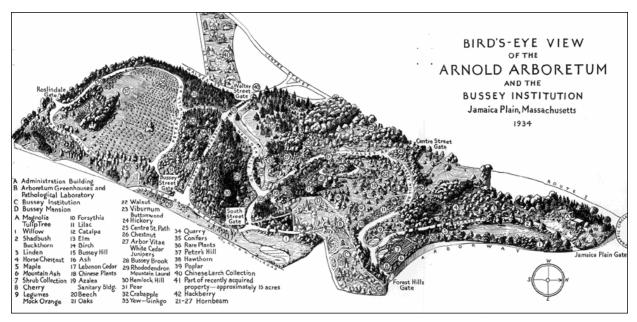
Questions for Reading 3
1) In what ways was the development of Arnold Arboretum an experiment? What kinds of questions did Sargent need to answer before he could begin planting?
2) What considerations did Olmsted and Sargent have to think about when planting trees? How are the concepts of a park and an arboretum potentially at odds with each other?
3) Why was 1886 an important year for both Olmsted and Sargent?
4) What legacy did the collaboration between Olmsted and Sargent leave to those who love trees and quiet, open spaces?



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Visual Evidence

Drawing 1: Bird's-eye view of Arnold Arboretum, 1934



(Photographic Archives of the Arnold Arboretum)

All of the arboretum's plants are easily accessible to pedestrians, and there is something of interest to see at every season of the year. Each plant is labeled with its common and scientific names, age, and origin.

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Questions for Drawing 1

1) How many species of woody plants	s listed on Drawing 1	1 do you recognize?	Which of these
are found in your community?			

2) Based on Drawing 1, what aspects of the plan illustrate Sargent's priorities for the arboretum? What aspects illustrate Olmsted's priorities?

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Visual Evidence

Photo 1: Construction near main entrance on Meadow Road, c. 1892



(National Park Service)

The administration building houses the arboretum's offices, horticultural library, herbarium, and lecture room.

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Questions for Photo 1
1) Locate the administration building on Drawing 1.
2) What is the use of the building? Why would this building have been a necessary part of the arboretum?
3) What do the men in the photo appear to be doing?

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Visual Evidence

Photo 2: Kalmia (Mountain Laurel) in bloom, Hemlock Hill, c. 1900



(Francis Loeb Library, Graduate School of Design, Harvard University)



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Questions for Photo 2

1) Try to pick out natural features and features that Olmsted and Sargent designed. What are the reasons for your choices?
2) Olmsted did not think that activities should be mixed together on the same landscape. Where in this photo can you find his idea of separation? Why do you think he regarded such separations as necessary?
3) How do you think people without carriages might have reached the arboretum?
4) Do you think a view such as this was equally pleasurable to Olmsted and Sargent? Why or why not?

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Putting it All Together

The following activities will help students learn about local trees and shrubs, understand the planning that goes into developing parks, and learn about the history of parks in their area.

Activity 1: Being a Plant Explorer

Have your students read the following vignette:

The year is 1910. Ernest Henry Wilson, Sargent's most famous plant explorer, has been caught in a landslide and may need to have his leg amputated (this is true; they saved his leg). To continue his mission he needs you to find trees and shrubs in your neighborhood that Sargent might want for his arboretum. Remember that Sargent requires information about where the sample was found, a soil sample to determine the best way to grow it, a well cut branch (be sure to obtain permission), seeds if possible, a photograph of the tree, and a map showing where this tree grows.

Have students determine--perhaps with the help of a botany or biology teacher--what uses the tree might have (as a source for a product or as an ornamental specimen) and whether it is a native plant or a foreign variety. If the latter, ask them to find out where it came from. When students have completed their research, help them make a classroom display that illustrates the different trees and shrubs found in their area.

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Activity 2: Park Rules and Regulations

One aspect of the Arnold Arboretum's agreement with the city of Boston was that its managers would be in charge of the "preservation of order and good conduct and the observance of the rules." Divide the class into small groups and ask each group to plan a new park or arboretum for their community. Have them list the qualities and characteristics that their group would want in a park or arboretum. Have them plan the type of open space that would have those qualities and then decide on the rules that would need to be enforced.

The kinds of questions each group needs to think about include the following: Will dogs, bicycles, or in-line skates be allowed? Will people be allowed to picnic? Will the park include recreational facilities such as baseball diamonds, golf courses, or swimming pools? Discuss the effect of their choices on the characteristics the group defined in the beginning of the activity.

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Activity 3: Researching a Local Park

Have students choose a local park or other green space to study. Ask them to use a municipal or local historical society library to find out the following information: Why and when was the park developed? What purposes was it meant to serve? How effectively did it meet those purposes? Were there conflicts about use of the park by people with different leisure and recreation needs? Has the park changed significantly over time? Has it been redesigned? Are there features that reflect Sargent and Olmsted's priorities for Arnold Arboretum? Encourage students to prepare a short oral report for class, or present their information in a research paper. Consider taking the class on an outdoor excursion to participate in a "park-clean up" activity.

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References and Endnotes

Reading 1

Reading 1 was compiled from Polly M. Rettig, "Arnold Arboretum" (Suffolk County, MA) National Register of Historic Places Registration Form, Washington, DC: U.S. Department of the Interior, National Park Service, 1975; S. B. Sutton, *Charles Sprague Sargent and the Arnold Arboretum* (Cambridge: Harvard University Press, 1970); and Cynthia Zaitzevsky, *Frederick Law Olmsted and the Boston Park System* (Cambridge: Belknap Press, 1982).

¹Cynthia Zaitzevsky, *Frederick Law Olmsted and the Boston Park System* (Cambridge: Belknap Press, 1982), 142.

² S. B. Sutton, *Charles Sprague Sargent and the Arnold Arboretum* (Cambridge: Harvard University Press, 1970), 50.

Reading 2

Reading 2 was compiled from Polly M. Rettig, "Arnold Arboretum" (Suffolk County, MA) National Register of Historic Places Registration Form, Washington, DC:U.S. Department of the Interior, National Park Service, 1975; Cynthia Zaitzevsky, *Frederick Law Olmsted and the Boston Park System* (Cambridge: Belknap Press, 1982); and documents housed at the Frederick Law Olmsted National Historic Site.

¹Frederick Law Olmsted, *Public Parks and the Enlargement of Towns*, 1870, p. xx. ²As cited in Charles E. Beveridge, "Frederick Law Olmsted's Theory of Landscape Design," 19th Century 3, no. 2 (Summer 1977), 39-40.

³F. L. Olmsted to Chas. S. Sargent, July 8, 1874, Olmsted Papers, Library of Congress, Washington DC

Reading 3

Reading 3 was compiled from Polly M. Rettig, "Arnold Arboretum" (Suffolk County, MA) National Register of Historic Places Registration Form, Washington, DC: U.S. Department of the Interior, National Park Service, 1975; and S. B. Sutton, *Charles Sprague Sargent and the Arnold Arboretum* (Cambridge: Harvard University Press, 1970).

¹Chas. S. Sargent to Joseph Dalton Hooker, April 12, 1878, Library, Royal Botanical Gardens at Kew, Richmond, Surry, England.

- ² Chas. S. Sargent, *Annual Report of the President and Treasurer of Harvard College*, 1885-86 (Cambridge, Mass.,1887), 123.
- ³ S. B. Sutton, Charles Sprague Sargent and the Arnold Arboretum, 69.
- ⁴ Chas. S. Sargent, The First Fifty Years of the Arnold Arboretum, vol. 3, no. 3, (1922), 168-69.

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Boston's Arnold Arboretum: A Place for Study and Recreation

Additional Resources

By looking at *Boston's Arnold Arboretum: A Place for Study and Recreation*, students discover how the first arboretum in the United States became part of the burgeoning urban park movement in the second half of the 19th century. Those interested in learning more will find a variety of interesting materials online.

Frederick Law Olmsted National Historic Site

Frederick Law Olmsted National Historic Site is a unit of the National Park System. Visit the <u>park's web pages</u> for a detailed history of Olmsted as well as information about the Olmsted Archives that has historic documentation for Olmsted-designed landscapes. Also featured on the site is the Olmsted Center for Landscape Preservation (OCLP) providing technical assistance to historic properties in cultural landscape research, planning, stewardship and education.

National Register of Historic Places Program: Landscape Initiative

Learn more about the <u>National Register of Historic Places Program: Landscape Initiative.</u> This program promotes responsible preservation practices that protect our nation's irreplaceable legacy--designed landscapes such as parks and gardens, as well as vernacular historic landscapes such as farms and industrial sites.

The Arnold Arboretum of Harvard University

Visit the <u>Arnold Arboretum website</u> for more information about this research and educational institution. It manages a collection of hardy trees, shrubs, and vines located on 281 acres in Boston, Massachusetts and associated herbarium and library collections. The grounds were planned and designed by the Arboretum's first director, Charles Sprague Sargent, in collaboration with the landscape architect, Frederick Law Olmsted as part of Boston's Emerald Necklace park system.

Visit Some of the Parks Created by Frederick Law Olmsted

- Stanford University Campus
- The Grounds of the United States Capitol
- Central Park
- Belle Isle Park
- The Biltmore Estate Gardens

The Cultural Landscape Foundation

The <u>Cultural Landscape Foundation</u> is the only not-for-profit foundation in America dedicated to increasing the public's awareness of the importance and irreplaceable legacy of cultural landscapes. Visit their website for more information on what cultural landscapes are and what they represent. Also learn about endangered landscapes and grassroots efforts to preserve them.

Library of Congress

Visit the <u>Digital Collections website</u> to search through the archives for the writings of Frederick Law Olmsted, pictures from his personal collection, and information on his various parks. Also search for information on the industrialization of America, the reactionary movements to the consequences, and Arnold Arboretum. Of special note are the environmental and landscape photographs of Arnold Arboretum.

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Boston's Arnold Arboretum: A Place for Study and Recreation

American Journal of Botany

Browse the <u>American Journal of Botany</u>, a journal devoted to the study of plants, for a variety of articles on botany.

For Further Reading

Students (or educators) wishing to learn more about Frederick Law Olmsted, Charles Sprague Sargent, or the Arnold Arboretum may want to read: Ida Hay, *Science in the Pleasure Ground: A History of Arnold Arboretum* (Boston: Northeastern University Press, 1995); Witold Rybczynski, *A Clearing in the Distance: Frederick Law Olmsted and America in the Nineteenth Century* (New York: Scribner, 1999); S. B. Sutton, *Charles Sprague Sargent and the Arnold Arboretum*(Cambridge: Harvard University Press, 1970); and Cynthia Zaitzevsky, *Frederick Law Olmsted and the Boston Park System* (Cambridge: Belknap Press, 1982).







