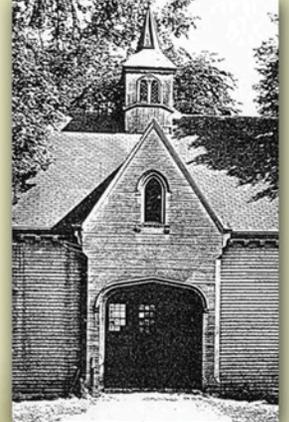


Brookline

COMPREHENSIVE PLAN 2005-2015



Issues and Opportunities



TOWN OF BROOKLINE, MASSACHUSETTS

Brookline

COMPREHENSIVE PLAN | 2005–2015
ISSUES AND OPPORTUNITIES



Reports drafted in 2000-2002

Adopted by the Brookline Board of Selectmen - December 14, 2004

Adopted by the Brookline Planning Board - January 13, 2005

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INTRODUCTION

Long range planning is not something we can afford to do only once. Brookline must keep pace and maintain control of its future, and with this foresight the process of looking ahead will be continuous. Brookline Planning Board, *Planning for Brookline*, January 1960

The Town of Brookline is preparing a Comprehensive Plan to guide community conservation, development, and investment decisions. The Plan will articulate clear vision statements, measurable goals, and functional policies. The Plan will also advance supporting recommendations and implementation strategies to insure that it will play an ongoing role in Town decision-making processes.

The general Comprehensive Plan work program was approved by the Board of Selectmen in October 2000 and is described in greater detail below. The basic planning approach and underlying tasks and processes defined by the work program were previously reviewed by the Planning Board, Board of Selectmen, Advisory Committee, League of Women Voters, and other community interests during a number of public meetings.

Brookline's Commitment to Comprehensive Planning

Brookline's Commitment to Comprehensive Planning spans over four decades. In 1957, Town Meeting first approved funds to employ professional planners to prepare a Comprehensive Plan. This initial plan was adopted by the Brookline Planning Board in 1959 following two and one half years of concentrated effort.

In 1976 and 1989, Brookline's Comprehensive Plan was revised through the efforts of Comprehensive Plan Review Commissions appointed by the Board of Selectmen. Both the initial and revised Comprehensive Plans were created through the dedicated efforts of citizens committed to addressing both issues and opportunities facing the community and to setting goals and recommendations to guide Brookline's future.

Figure 1 provides a brief profile of the three previous comprehensive plans prepared for Brookline. These plans, particularly the most recent plan adopted by the Planning Board in 1989, will serve as important resources.

In addition to the preparation and adoption of the three Comprehensive Plans, Brookline has produced

a significant number of special area, commercial district, and neighborhood-based plans and studies that will be consulted throughout the planning process.

In addition, a number of recent and on-going planning, development, and capital improvement studies have been completed or initiated that must be considered as part of the planning process. These include:

- * Urban Ring Major Investment Study
- * Strategic Development Study for the Boston Extension of the Massachusetts Turnpike Air Rights
- * Brookline Town-wide Development Study
- * Beacon Street Improvement Project
- * Brookline Open Space Plan 2000
- * Selectmen's Open Space Task Force Report
- * Emerald Necklace Conservancy
- * Brookline Storm Water Management Plan
- * Chestnut Hill Village Plans
- * MetroArea Plan 2000
- * Access Boston 2000-2010
- * 2000-2025 Transportation Plan for the Boston Region
- * Community Sustainability Partnership
- * Brookline Commercial Areas Parking Strategy

Existing Brookline Comprehensive Plans	
1959 COMPREHENSIVE PLAN	
Prepared and Adopted by	Planning Board
Date Adopted	25 June 1959
Professional Staff	Adams, Howard, & Greeley, Planning Consultants
Plan Elements	Part I Text, Part II Maps, and A Citizen's Guide to the Comprehensive Plan
Plan Focus and Content	Land Use, Circulation, and Community Facilities
1976 COMPREHENSIVE PLAN	
Prepared by	Comprehensive Plan Review Commission and Comprehensive Plan Task Force
Adopted by	Planning Board
Date Adopted	15 June 1976
Professional Staff	Brookline Department of Planning
Plan Elements	Goals, Policies, and Proposals for Land Use, Environment, Circulation and Transportation, Community Facilities and Services, and Putting the Plan to Work
1989 COMPREHENSIVE PLAN	
Prepared by	Comprehensive Plan Review Commission
Adopted by	Planning Board
Date Adopted	13 April 1989
Professional Staff	Brookline Department of Planning, Department of Public Works, and Preservation Commission
Plan Elements	Goals, Policies, and Action Programs for Physical Design, Historic Preservation, Housing, Commercial Areas, Institutional Land Use, Community Facilities and Services, Transportation, Natural Environment and Energy Conservation, and Putting the Plan to Work

FIGURE 1
Matrix of Existing Brookline Comprehensive Plans

Plan Objectives

Brookline has a unique opportunity to not only build upon its successful commitment to planning, but to also shape a truly new form of comprehensive plan that will be based upon the following key objectives.

1. Consistency with Section 81-D of the Massachusetts's General Laws, which establishes the authority, objectives, content, and application of comprehensive plans, and Executive Order 418 which was signed by the Governor to provide guidance and technical assistance for the preparation of Community Development Plans.
2. Build upon Future Search and supporting efforts by the Brookline League of Women Voters.
3. Establish the Plan as two interrelated parts: the Comprehensive Plan to provide a ten year horizon as the basis for long-term goals; and an Action Plan that will span a five year period and include annual opportunities for updates.
4. Facilitate participation processes that will insure citizen involvement both during the comprehensive planning process and throughout implementation.
5. Active and ongoing involvement by all the Town's boards and commissions.
6. Consensus on community vision statements, goals, and recommendations that will sustain our local environment, commercial areas, residential neighborhoods, and quality of life.
7. Focus on key issues and opportunities and establish measurable and action-oriented goals.
8. Identify implementation time frames and responsibilities.
9. Coordinate with the City of Boston, City of Newton, Metropolitan Area Planning Commission, and other jurisdictions to insure local and regional planning consistency.
10. Establish an interdepartmental team to not only produce a workable and unified Plan, but also to establish consensus and commitment for implementation.
11. Integrate the Plan as part of the Town's Geographic Information System (GIS) and web site in order to take advantage of and build upon the expansive information, analytical, and mapping capacity, and to insure continuous access and application to current and future plans, projects, and programs.
12. Enable ongoing measurement, monitoring, and review of Plan implementation and performance.

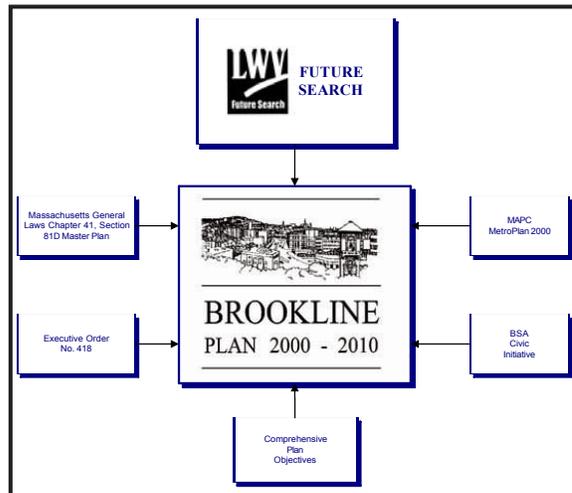


FIGURE 2
Plan Coordination & Legislative Basis

Plan Organization

The Brookline Plan will consist of two interrelated parts (see Figure 3): the Comprehensive Plan and the Action Plan.

The Comprehensive Plan will provide the long-term vision, goals, and recommendations at both the Town-wide and neighborhood levels. A ten-year planning horizon will be established. Specific issues and opportunities and the long-term community vision will serve as the underlying basis for advancing goals and recommendations.

The Action Plan will be implementation oriented. It will outline specific strategies and responsibilities for implementation of the Comprehensive Plan recommendations on an annual and five year basis. The Action Plan will be updated annually to demonstrate implementation progress and to insure that it remains a vital part of the Town's decision-making process.

Both during and after the initial planning effort, the two-part Brookline Plan will engage a continuous and strategic process that will involve and shape the future of our community.

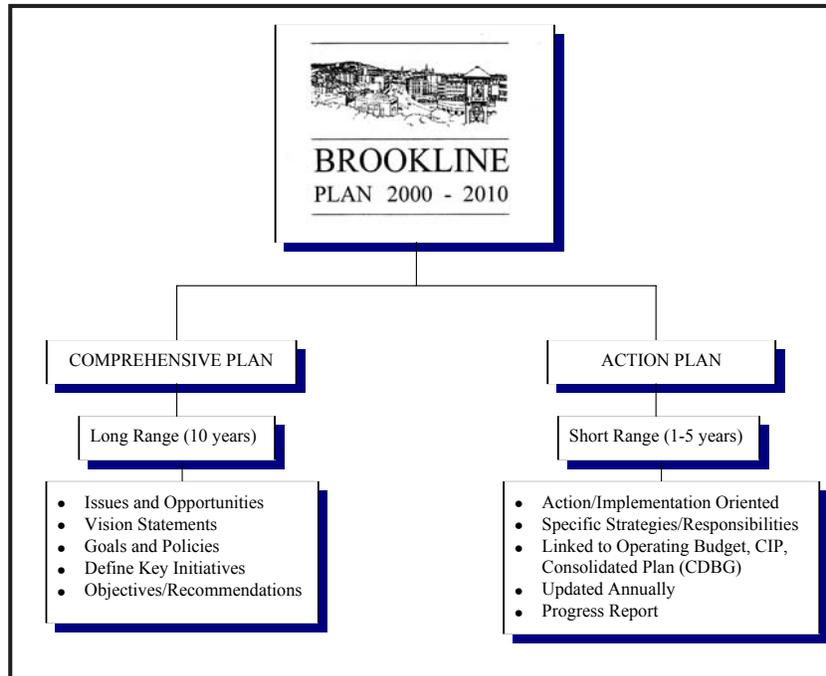


FIGURE 3
Plan Organization

Planning Team

On August 22, 2000, the Board of Selectmen appointed the Comprehensive Plan Committee to guide the formulation of both the Comprehensive and Action Plans. The basic charge to the Committee is as follows.

1. To approve final work program and process to guide the preparation of the Comprehensive Plan.
2. To participate in the formulation of a scope of work and the selection of planning consultants to assist with the preparation of the Comprehensive Plan.
3. To insure that the Comprehensive Plan is created through a broad-based participation process.
4. To facilitate Comprehensive Plan Committee meetings to insure ongoing and active participation by all members and citizens.
5. To actively participate in various Town-wide and neighborhood based comprehensive planning forums and meetings.
6. To define specific issues and opportunities at both the Town-wide, neighborhood, and district levels that will focus the Comprehensive Plan's recommendations.
7. To establish proactive goals, policies, and recommendations to address the Plan's key focus areas and underlying elements.
8. To advance an implementation program to insure that the Comprehensive Plan will be an interactive part of Town decision making.
9. To report periodic progress during the preparation of the Comprehensive Plan to the Board of Selectmen and Planning Board.
10. To submit the following Comprehensive Plan reports to the Planning Board and Board of Selectmen:
 - a. Issues & Opportunities Report
 - b. Preliminary Comprehensive Plan
 - c. Final Comprehensive Plan & Action Plan

Two members of the Board of Selectmen serve as co-chairs. Subcommittees may also be convened to work with the Director on specific work programs, process, participation, agendas, and related elements of the Plan throughout the process.

The Department of Planning and Community Development provides professional and technical staff to lead and support the comprehensive planning effort. The Planning Division's professional planners will all participate in various aspects of the planning process. Staff from the Department's Housing and Historic Preservation Divisions will also participate in the planning process on a periodic basis.

The Town's comprehensive planning team also includes direct staff participation from the following other key departments that have a stake in the Plan's recommendations and implementation:

- * Assessor
- * Building
- * Economic Development
- * Fire
- * Information Systems (GIS)
- * Police
- * Public Works
- * Recreation
- * Schools

Economic Development will play a key role during the formulation of both the housing and commercial area elements of the Plan. The Park and Open Spaces, Conservation, and Engineering and Transportation Divisions from the Department of Public Works will assist in shaping the Parks, Open Space, and Greenways, Water Quality, and Transportation elements.

The departments of Police, Fire, Recreation, Schools, and Building will assist in preparing the Community Facilities and Services element. Specifically, the Department of Planning and Community Development will coordinate with the Recreation Department to insure that the proposed Recreation Master Plan and Comprehensive and Action plans are produced together with unified work programs.

Participation & Communication

Active public participation by the Committee, residents and businesses of Brookline throughout the planning process is essential for the Plan to be successful. To insure that the Plan is developed through a truly broad-based participation process, a wide range of forums, techniques, and mediums will be employed. The following describes the key participation and communication strategies which are part of the initial phases of the planning process.

1. Seven Neighborhood Forums were held across Town where participants identified preliminary issues and opportunities that the Plan should address. Over 400 citizens participated directly in the seven Neighborhood Forums which were held at central locations in each neighborhood from March 2001 through October 2001.

2. Community Forums, Workshops and Open Houses will be conducted throughout the planning process. These events will be structured around the key issues and opportunities to define preliminary vision statements and plan goals. The forums will be scheduled and structured to facilitate broad based participation by the Planning Board, Comprehensive Plan Committee, Board of Selectmen, other appointed boards and commissions, Town Meeting Members, neighborhood associations and, most importantly, residents and business interests. The consultant planning firm will assist the Department of Planning and Community Development and the Comprehensive Plan Committee with both the planning and facilitation of the forums.

3. The Brookline Plan On-line will be a part of the Town's web site (www.townofbrooklinemass.com) and provide an interactive format for Plan dissemination, review, and comment. All plan reports will be incorporated as part of the Town's web site, as well as a calendar of public meetings related to the Plan. An email address has also been established to provide an additional opportunity for public feedback and questions (comp-plan@town.brookline.ma.us).

4. Each Draft Comprehensive Plan Report will be formatted to facilitate Committee and public comment and interaction.

5. The Planning Board and Board of Selectmen will receive periodic progress reports. These meetings will provide additional forums for public comment during the planning process.

6. Reports on Comprehensive Plan Progress will also be made to Future Search, Neighborhood

Alliance, and other interest groups to insure ongoing and active involvement.

7. GIS based approach to Plan formulation to insure integration and access of new layers of data, information, analysis, and recommendations.

8. The Brookline TAB and Boston Globe will be encouraged to print periodic articles that will reach a wide audience to enable public comment. The feasibility of the TAB inserts will also be explored as a means to obtain community interaction during the planning process.

9. Cable Access Program - The Brookline Plan will be either independently produced through Brookline Access Television or associated with an existing program.

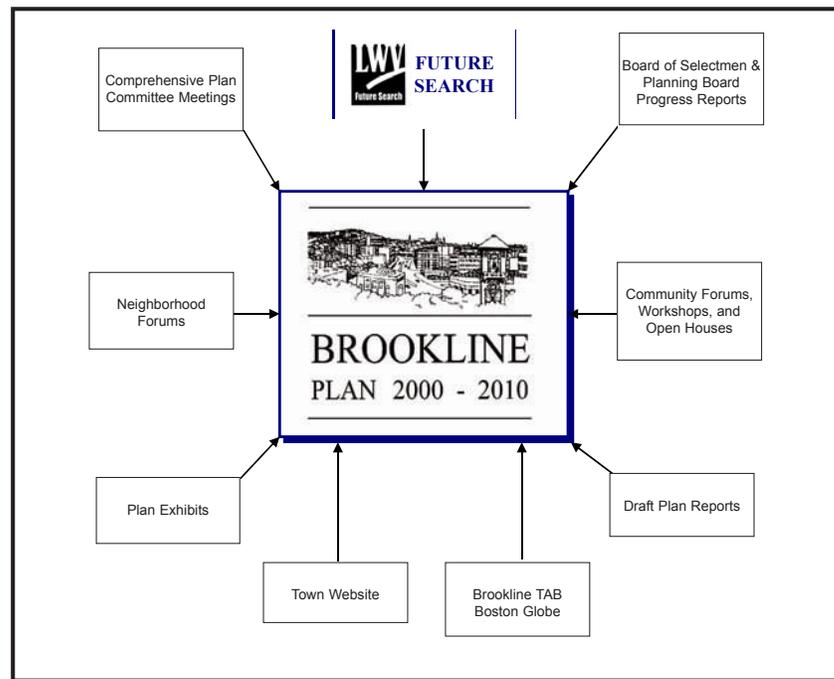


FIGURE 5
Participation Process

Report 1	Parks, Open Space, & Greenways	October 2000
Report 2	Water Quality Management	November 2000
Report 3	Historic Preservation	December 2000
Report 4	Economic Development	January 2001
Report 5	Housing	February 2001
Report 6	Schools	March 2001
Report 7	Recreation	April 2001
Report 8	Travel & Mobility	May 2001
Report 9	Information Technology	September 2001
Report 10	Town Facilities	September 2001
Report 11	Arts & Culture	September 2001

FIGURE 6
Schedule for Completion of Draft Issues & Opportunities Reports

Work Program

The Comprehensive and Action Plan work program is divided into six basic phases (See Figure 7) with a series of interrelated tasks. The following describes the interrelated phases and tasks associated with the work program.

**PHASE I
DRAFT AND FINAL WORK PROGRAM**

Following approval of the FY2001 Financial Plan at the May 2000 Town Meeting, the Department initiated the following tasks: refinement of the draft Comprehensive Plan work program; preparation and distribution of a Request for Qualifications; development of the Comprehensive Plan report format and web-site; and assistance leading to the appointment of the Comprehensive Plan Committee.

The basic planning approach and underlying tasks and processes defined by the Comprehensive Plan Work Program have been previously presented and reviewed with the Planning Board, Board of Selectmen, Advisory Committee, League of Women Voters, and other community interests during a number of public meetings.

The work program builds on the current state enabling legislation, Future Search and the objectives previously outlined. The Department also reviewed a number of national award winning comprehensive and related planning efforts complied by the Planning Advisory Service of the American Planning Association to insure that the work program would reflect recognized best practices in the field of planning today.

**PHASES II & III
EXISTING CONDITIONS & TRENDS
ISSUES & OPPORTUNITIES**

The Comprehensive Plan will require the compilation and analysis of existing conditions and trends related to each of the Plan elements. The results of these efforts are presented here as part of the eleven Issues and Opportunities reports.

This phase has utilized data and information currently available as part of the Town's existing GIS and other

available data sources.

Issues and Opportunities

A series of eleven reports have been created to define key issues and opportunities that will be associated with the Plan's focus areas and underlying elements (see Figure 4). Each report is formatted to facilitate comment and refinement.

The reports herein summarize relevant existing conditions and trends defined in Phase II, as well as identify key issues and opportunities.

The reports build upon previous planning efforts completed to date such as the Open Space, Storm Water Management, Affordable Housing and Commercial Areas Parking reports. Ongoing planning efforts such as local and regional transportation studies now being completed are incorporated.

Related planning efforts, such as the results of initial surveys and analysis related to recreation needs, programs and facilities will be addressed.

During this phase of work, the seven neighborhood forums, discussed previously, were initiated to involve the community in the identification and prioritization of issues and opportunities.

**PHASE IV
CONSULTANT SELECTION
VISION, GOALS, AND FOCUS AREAS**

Consultant Selection

During this phase, a Request for Proposal (RFP) will be issued to retain the services of a consultant planning firm to assist with the comprehensive planning effort.

The RFP includes a detailed scope of work that will focus on the following basis tasks:

1. Preparation and facilitation of Community Forums that will define preliminary community vision and goals.
2. Production of the preliminary Comprehensive Plan report.

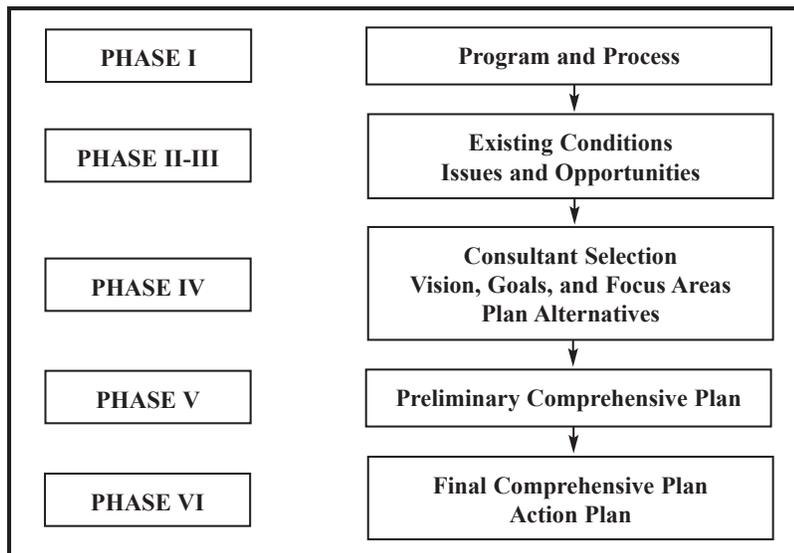


FIGURE 7
Work Plan Phases and Schedule

3. Production of the final Comprehensive and Action Plan reports.

Vision, Goals, and Focus Areas

The Comprehensive Plan's preliminary vision statements, goals, and focus areas will be formulated by the community during this phase of work. A preliminary synthesis and prioritization of the issues and opportunities defined during Phase III will provide a framework to focus this visioning and goal-setting effort.

A detailed work program and process for this phase will be developed and managed by the consultant firm in conjunction with the Comprehensive Plan Committee.

This phase of work will include community-wide forums, meetings, and open houses that will be structured and scheduled to enable broad-based participation, discussion, and consensus building. These forums and meetings will be facilitated by the consultant planning firm, Department of Planning and Community Development, and other Town personnel that will participate in Phase III.

The public forums will be expanded through various mediums to enable widespread participation. The Town's website and the TAB will provide alternative ways to achieve maximum participation.

**PHASE V
PRELIMINARY COMPREHENSIVE PLAN**

Based on the final issues and opportunities and the vision and goals defined through the Community Forums, the preliminary Comprehensive Plan will be produced. The Comprehensive Plan consultant will lead the preparation of the Preliminary Comprehensive Plan in conjunction with the Comprehensive Plan Committee and the Department of Planning and Community Development.

The reports will be published as part of the Town's website and copies of the reports will be available in various Town facilities. Articles will also be submitted to local media outlets to provide information about the preliminary Plan to the public.

Each preliminary Comprehensive Plan report will be structured and formatted to facilitate public review and comments including reviews by the Planning Board, Board of Selectmen, and other boards and

commissions.

This phase of the work program will be completed upon the submission of the preliminary Comprehensive Plan to the Planning Board and Board of Selectmen.

**PHASE VI
FINAL COMPREHENSIVE PLAN & ACTION PLAN**

Based on the review of the preliminary Comprehensive Plan, a final Plan will be produced. The final Plan will reflect comments and recommended revisions assembled during the outreach process outlined in Phase IV.

The final Comprehensive Plan will go to the Board of Selectmen for a hearing. The Board of Selectmen, in turn, will send the document to the Planning Board for final review and approval as outlined in state law.

After the completion of the final Comprehensive Plan, work will be initiated on the Action Plan report. The initial Action Plan will define specific implementation strategies and responsibilities that pertain to the Comprehensive Plan's recommendations, with a particular focus on actions that should be undertaken in the first year or two.

The draft Action Plan will be prepared for public review, including review by members of the Comprehensive Planning Committee, Planning Board, Board of Selectmen, Town Administrator, and Town Department heads. It will then go to the Planning Board for adoption as a part of the Comprehensive Plan.

It is anticipated that both the Comprehensive Plan and the Action Plan will undergo periodic updates. The Comprehensive Plan will be updated as needed. The Action Plan will be updated annually, in a similar manner as the Town's Capital Improvement Program.

focus area 1 RESOURCES

PARKS, OPEN SPACE & GREENWAYS



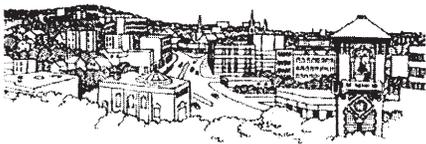
Credit: Alyssa Cook



Credit: Michael Berger



Credit: Michael Berger



BROOKLINE
COMPREHENSIVE PLAN 2005-2015

issues & opportunities report

INTRODUCTION

Parks, open spaces, and greenways are critically important assets that immeasurably contribute to Brookline's quality of life. These resources enhance the visual beauty of our neighborhoods, provide places for enjoying nature, and help establish environmental balance.

Brookline's parks, open spaces, and greenways include both publicly and privately owned land with characteristics ranging from intensely managed landscapes to uncultivated woodlands. This section focuses primarily on places used for passive enjoyment of the outdoors, while the Recreation section addresses active recreational and athletic facilities.

The purpose of this report is to identify issues to address and opportunities to improve Brookline's parks, open spaces, and greenways. Since understanding the historical development of these elements is a critical first step in understanding where we are today and in determining where we want to go in the future, this report begins with a brief historical sketch

of the development of Brookline's parks, open spaces, and greenways.

Following the historical sketch is a general inventory of Brookline's existing parks, open spaces, and greenway system which focuses on quantitative and qualitative descriptions of our current system.

The historical sketch and description of the existing system leads to the conclusion of this section which identifies important issues and opportunities intended to guide the development of community goals and policies for improving our parks, open spaces, and greenways.

Historical Sketch of Brookline's Parks & Open Spaces

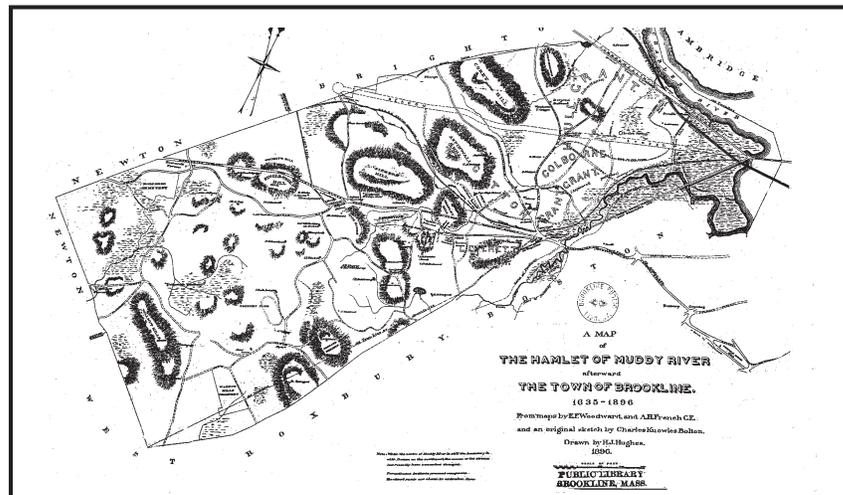
Brookline is a unique historical microcosm of the American cultural landscape. Evidence of the significant events that have shaped this nation from the mid-sixteen hundreds to the 21st Century still exist within the Town's living landscape.

In 1640, a British officer, Captain Joseph Weld, received a 2,000-acre land grant, which included the present-day Goddard Avenue, the Greek Orthodox Church, Park School, Arnold Arboretum, and Allandale Farm. This working farm, still owned by descendants of Captain Weld, is a significant element of the Brookline landscape that has flourished for over three hundred years. Neighboring the farm and former home of many generations of Welds, is Larz Anderson Park, given to the Town in 1948. Long prized for its views of Boston Harbor, as well as the sledding potential of its great hill, the park overlooks the still-extant farmhouse of John Goddard, George Washington's Wagon-Master. Nearby, at Warren and Walnut Streets, is the 17th Century geographic and

demographic center of Brookline, the Town Green. It was from here, in July, 1775, that three militia groups first set out to engage the British.

Walnut Street, formerly known as Sherbourne Road, was laid out in 1658 by the Massachusetts Bay Colony along what had been a Native American trail. Until the construction of the Worcester Turnpike in 1807, this was the only land route west from Boston. Within the Town Green area, is the Old Burying Ground, established in 1717.

From incorporation in 1705 to the early days of the 19th Century, Brookline was largely a farming community. As the population of Boston expanded, merchants began to purchase large areas of farmland for development. Fortunately, these first developers had the wisdom and wealth to create neighborhoods that can still be used as templates for successfully combining the natural and the built environment.



Both David Sears, at Cottage Farm in the 1830's, and Amos A. Lawrence, at Longwood in the 1850's, ensured that buildings were always sufficiently balanced by the presence of trees, parks, and playgrounds. Both Cottage Farm and Longwood Mall are listed in the State and National Register of Historic Places.

Respect for the local natural environment was not an isolated trend. Brookline continued to benefit from actions of other enlightened developers and designers, such as Alexander Wadsworth, who built the park-like residential areas of Linden Square and St. Marks Square, and Thomas Aspinwall Davis, a developer who put setback requirements and use restrictions into the master deeds of his homes.

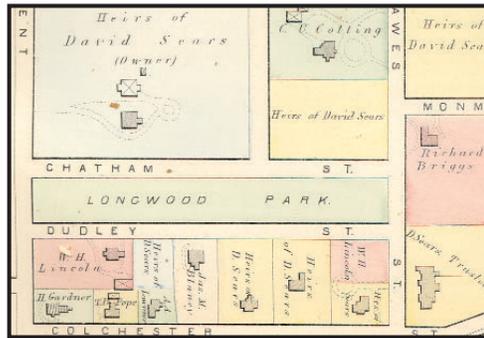
During the second half of the 19th Century, Brookline became the residence of many renowned architects and landscape architects, whose vision and talent have left a lasting national as well as local imprint on the cultural landscape. Among the most prominent was Frederick Law Olmsted, who made both his home and office in Brookline. His designs for the Emerald Necklace and Beacon Street translated the concept of European pleasure gardens and grand boulevards into the American vernacular, and they remain today an inspiration for community planners. Olmsted and his successors in the firm continued to influence the development of the Brookline landscape well into the 20th Century.

Brookline has not only been the home of nationally influential designers and architects, but many residents have also pioneered in land use and preservation. In 1871, the Town created the first public playing fields: Cypress Field and Boylston Street Playground, and in 1895, built the first public pool. In 1882, The Country Club, the first in the nation, was founded for the purpose of maintaining open land for riding and recreation. During the same period, the Tree Planting Committee was established, also a first, which remained unique for many years. As late as 1934, it was the only such town committee in the state. In 1895, Minna Hall and Harriet Hemmenway founded the Massachusetts Audubon Society, which eventually grew into a national environmental organization of great power and influence.

The reputation of Brookline as an attractive suburb steadily increased through the late 19th Century. Large estates were redeveloped and the reconstruction of Beacon Street caused an explosion in development: between 1900 and 1920, the population went from 19,935 to 37,348. In an effort to handle the threat of unrestricted building, the Brookline Planning Board was established in 1914. Frederick Law Olmsted, Jr. was elected chairman, a further example of the Brookline tradition of encouraging enlightened development. The Board's first decision established a setback policy regarding

building lines in order to preserve more open space on certain streets, and a zoning code was created in 1922. Many areas in Town immediately sought designations as single-family zones, among them, Pill Hill, Fisher Hill and parts of Aspinwall and Corey Hill, with the result that those neighborhoods still retain the open and green aspects that define much of the Town.

Because the initial 1922 zoning code essentially formalized the existing status of land use, many undeveloped sections in South Brookline have remained in a natural state. This has allowed the protection of two ancient wetlands as conservation land: Lost Pond and D. Blakely Hoar Sanctuary.



Longwood Mall, 1874

Source: GM Hopkins & Co, Atlas of the Town of Brookline, Mass.

While South Brookline preserves an unparalleled treasure of early landscape history, it also contains a significant mid-20th Century cultural landscape: Hancock Village. Developed after World War II as a community for returning soldiers and their families, its small, attached two-story brick buildings are set in and around low puddingstone hillocks surrounded by broad green lawns well-suited to the games of children and neighborly interaction.

Brookline has a long, rich heritage of preserving open space for present and future generations. Much of our present day open space is the legacy of many civic minded citizens in the past who looked ahead and anticipated the need for parks, conservation areas, and recreation facilities. Larz Anderson Park, Longwood Mall, Linden Square, and other green-spaces were given to the town for public use. D. Blakely Hoar left funds in his will to purchase land for a bird sanctuary. In 1902, the Reservoir on Boylston Street was purchased by the Town with a

large contribution by citizens including John C. Olmsted and Amy Lowell. Without these areas, Brookline would not be the place it is today.

The Town did not rely solely on the generosity of its citizens to provide its greenspace. Much of Brookline's public open space system was created by actions taken in the late 1800s and early 1900s. Town officials and citizens foresaw that the once farming community would urbanize and that greenspace and recreation facilities would be needed.

Since the mid-1800's, the Town has invested in its future by purchasing land to meet its recreation needs. In addition to the creation of Cypress

Street and Brookline Avenue Playgrounds, and the Brookline Pool, Putterham Meadows, the public golf course, was purchased by the Town in 1899. More recently in 1975, Town funds as well as state and federal grants were used to purchase Hall's Pond and Amory Woods Sanctuary.



Amory Woods Sanctuary, 1999

Credit: Jean Stringham

THE EXISTING SYSTEM

Brookline's park, open space, and greenway system includes conservation areas, parks, playgrounds, cemeteries, school yards, institutional lands, and farm fields, as well as private estates, vacant parcels, and streetscapes. Many open space parcels are linked by continuous vegetated areas, streetscapes, and transportation routes, forming various types of greenways, while others, such as neighborhood pocket parks, are isolated.

Much of the following is a factual overview and description of Brookline's park, open space, and greenway system drawn from the Brookline Open Space 2000 plan.

Brookline's existing park, open space, and greenway system is discussed here in four major categories: protected/unprotected open space, significant landscapes, the local and regional greenway system, and the urban forest system.

Protected/Unprotected Open Space

Brookline has approximately 1,159 acres of parks, open space, and greenways, which represents 26.6% of the Town's landbase. Figure 1, the Existing Parks & Open Spaces map, shows both public and significant tracts of private open space including conservation areas, land trust properties, parks and playgrounds, town, federal, and state properties, school playgrounds, agricultural and recreation areas, and private institutions. This map also indicates which properties allow public access.

It is likely to assume that the amount of protected park and conservation land will remain stable at its current size of 506 acres, or 11.7% of the Town's landbase. However, approximately 653 acres, or 56% of the Town's open space, is legally unprotected and, thus, potentially open for development (see Chart 1).

Land is considered protected if it has a conservation restriction, is subject to Article 97, or is owned by a conservation land trust (such as the Brookline Conservation Land Trust). The Article 97 Amendment is a provision of the

Massachusetts Constitution, added in 1972, which prevents the taking of public park, recreation, and conservation land for other purposes without a majority vote of the Conservation Commission or Park & Recreation Commission, Board of Selectmen, and Town Meeting, plus a two-thirds vote of both houses of the state legislature.

For the purposes of this inventory, lands assessed under G.L.-C.61A and 61B are not considered protected. These statutes enable property owners to gain a preferential property tax assessment for land in agriculture or recreation. A condition of these preferential assessments is that the Town holds the first right of refusal on any sale.

Although more difficult to quantify, streetscapes, vacant parcels, and large private estates significantly contribute to the open space system. In fact, most Brookline streets are lined with mature trees, and many large private estates still exist, particularly in South Brookline.

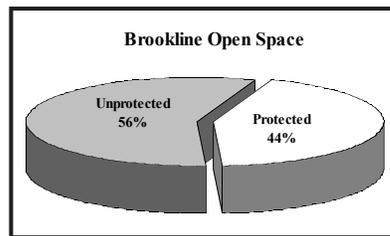


CHART 1

Data Source: Brookline Open Space 2000, pgs. 37, 39

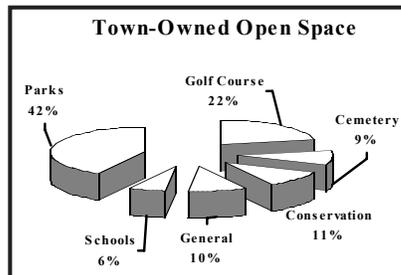


CHART 2

Data Source: Report of the Selectmen's Task Force on Open Space, 1999

Significant Landscapes

Brookline contains a broad variety of significant landscapes that help define the character of the Town (see Figure 2). The largest and most famous landscape is the Emerald Necklace. In the midst of a densely developed urban area, this green ribbon creates a visual and recreational respite. The views it affords and the opportunity to stroll away from hectic streets and through the naturalized landscape provide the relief from urban life envisioned by Frederick Law Olmsted.

Other special landscapes worthy of mention include

Allendale Farm, Walnut Hills Cemetery, The Old Burying Ground, The Country Club, Longwood Mall, Larz Anderson Park, Lost Pond Conservation Area and Reservation, D. Blakely Hoar Sanctuary, Putterham Woods, Fernwood, the Holy Transfiguration Monastery, Sargent's Pond, and Hall's Pond Sanctuary. These islands of nature continually help to form our impressions of an open, vibrant Town.

Frederick Law Olmsted made his home and practice at Fairsted, 99 Warren Street, now a National Historic

Site, from 1883 until his death. According to the Massachusetts Association of Olmsted Parks, Olmsted and his firm were involved with at least 191 landscape designs in Brookline from 1879 to 1965. Important projects include the Emerald Necklace Parks, the Holy Transfiguration Monastery, Soule Recreation Center, Pine Manor College, and the Fisher Hill neighborhood. Frederick Law Olmsted, Jr. was the first and longtime chairman of the Brookline Planning Board.



Corey Hill, 1999

Sixteen areas of Town have received National Register of Historic Places status, 12 of them with contributing historic landscapes. The districts with contributing landscapes include Olmsted Park/ Emerald Necklace, Pill Hill/High Street Hill, Longwood, Cottage Farm, Brookline Village Commercial District, Town Green, Beacon Street, Chestnut Hill, Cypress Street/Emerson Garden, Green Hill, Larz Anderson Park, and Fisher Hill.

A number of individual properties, many with important landscapes, have also been listed on the National/State Registers of Historic Places. Both the

individual and district designations offer some degree of protection for both public and private properties by requiring a review process if federal or state monies, approvals, or licenses are required.

Several Brookline hills provide significant views, creating important scenic landscapes. Corey Hill Park overlooks an impressive view of Boston

and Cambridge. Larz Anderson Hill provides eastward views to Boston and the harbor. On some days, one can see the Blue Hills from Walnut Hill.

Previous Open Space and Preservation Plans have proposed the following streets for designation under the Scenic Roads Act (see Figure 2): Cottage Street, Warren Street between the Town Green and Lee Street, Walnut Street from High to Warren Streets; and Heath Street from Hammond to Boylston Streets. Some of these roads coincide with bicycle touring routes that have also been proposed. Many other streetscapes are historic and important visual resources. Beacon Street, which is a historic boulevard that passes through three commercial areas, serves as a major entrance to the Town.

Local & Regional Greenway System

Many of Brookline's open spaces are visually, functionally, or physically linked with each other, creating both local and regional greenways.

Many of our parks and conservation lands tend to concentrate on particular activities, either active or passive recreation. Their usefulness can be enhanced and their full value optimized if the potential for connecting these spaces is realized.

Greenways can change the experience of a park-user. While currently much activity tends to be concentrated in isolated parks and conservation areas, greenways disperse activity and allow the individual to experience a greater variety of sights and sounds. The best example of this type of greenways is the Emerald Necklace. Long walks through a variety of landscapes engage the interest and distract the user more effectively from the surrounding urban area.

Greenways can also have ecological benefits by increasing the diversity of wildlife that can survive in an urban area. Most species need to be able to move on the ground without encountering developed areas, and some species will not go to an area unless there is sufficient vegetative buffer from human activity. The Emerald Necklace is an existing, protected ecological corridor.

There are three general categories of greenways: resource protection, access, and scenic protection. These types of greenways are defined below with specific Brookline examples.

RESOURCE PROTECTION GREENWAYS

Corridors of protected open space managed for conservation and recreation purposes

These greenways often follow natural land or water features, and link nature reserves, parks, cultural features and historic sites with each other and with populated areas.

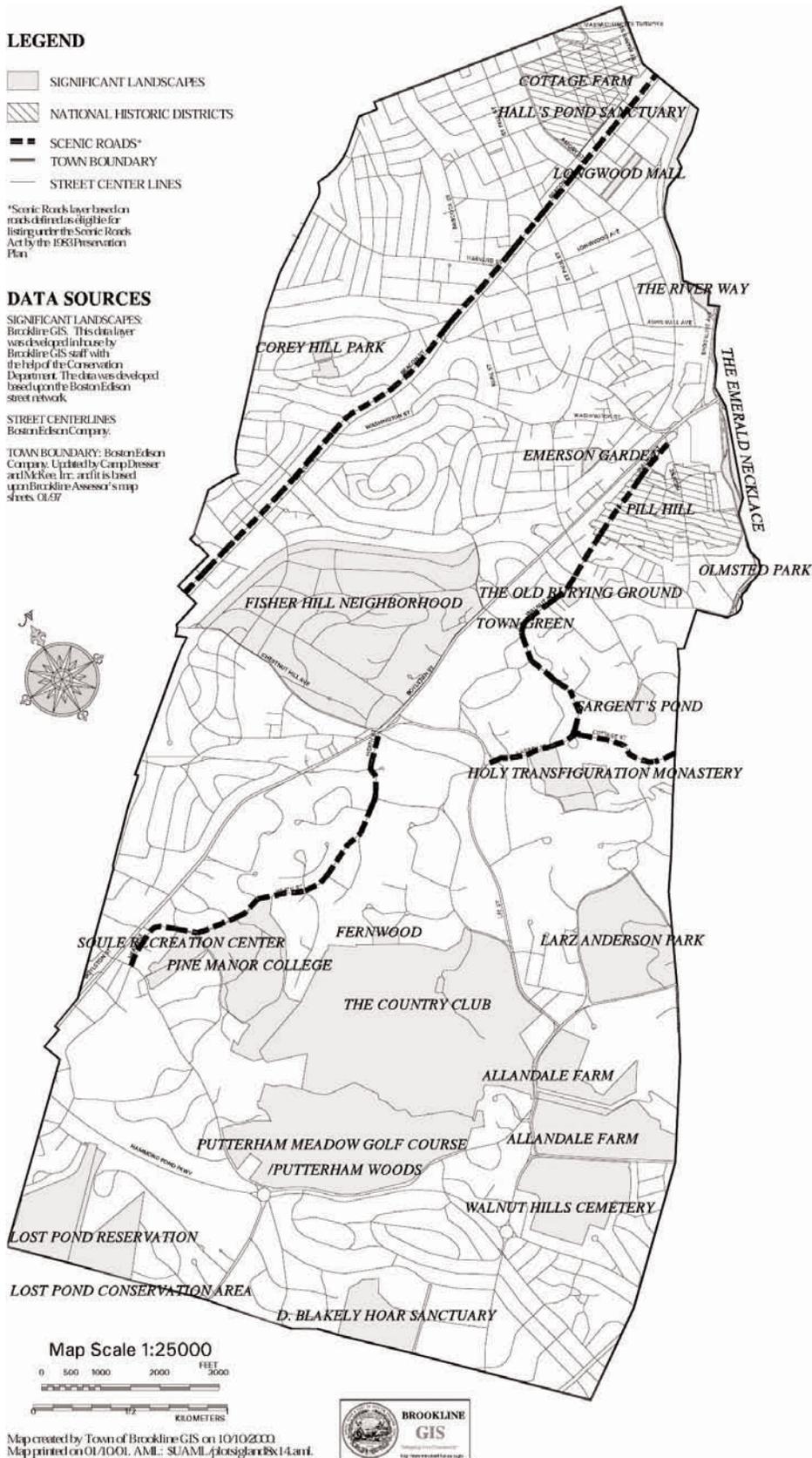
Resource protection greenways can be publicly or privately owned. Maintaining the connections that allow these natural flows and movements is a key to ecological integrity.

In some cases the complex of open spaces crosses Town boundaries. For example, The Emerald Necklace (a resource protection greenway) crosses Brookline and Boston city lines as it moves out Commonwealth Avenue Mall through the Fens, along the Riverway to Leverett, Ward and Jamaica Ponds and on to the Arnold Arboretum and Franklin Park.

The Charles to Charles Corridor is a resource greenway (encompassing parts of the Emerald Necklace) that extends from the Charles River in the West Roxbury neighborhood of Boston through Brookline and Newton to the Charles River in the Back Bay neighborhood of Boston. The physical components of the Charles-to-Charles Corridor, which was adopted by the Town in 1975, still exist, although largely unprotected. It has been a goal of past Open Space Plans and the 1989 Comprehensive Plan to protect critical land parcels in the corridor.

SIGNIFICANT LANDSCAPES

FIGURE 2



ACCESS GREENWAYS

Networks of landscaped streets, smaller parks, and trails/paths used for walking, bicycling, or other forms of recreation or transportation

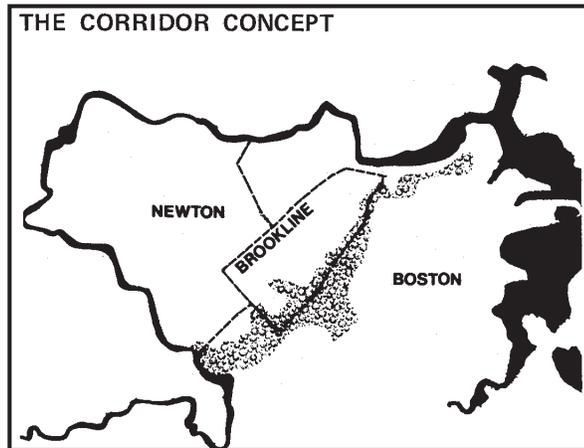
Most access greenways function on a local level, some have regional significance. Access greenways link residential areas with village centers, schools and public services, and existing park and recreational areas.

Transportation routes also need to connect open spaces, and proximity to public transportation routes can increase the availability of an open space to more residents. Consideration must be given to how users will travel to specific areas.

If one can bike to a park and then take a walk or engage in a sport, the experience is enhanced and other benefits associated with not using a car result. Well-landscaped walking routes can have the same effect on well-being. Parks and conservation areas

can serve as destination points or waysides along bicycle routes.

One example of an access greenway in Brookline is the Beacon Street corridor, an historic boulevard designed by Frederick Law Olmsted.



The Charles to Charles Corridor
Data Source: Brookline Open Space 2000, pg. 84

SCENIC PROTECTION GREENWAYS

Provide significant greenspace throughout the community, in the form of tree-lined streets and front yards, and consist of significant scenic views and vistas, as well

These greenways help maintain community character by creating a screen that promotes a visual greenscape. Streets lined with trees, buffer areas, or strips around the edges of properties are examples of scenic protection

greenways.

Two examples of scenic protection greenways in Brookline are Corey Hill and Larz Anderson Park, which have some of the best vantage points in Brookline. Other examples include visual connections between the various large private estate lands and institutions in South Brookline.

The Urban Forest System

The original forests in Brookline were cut long ago. Today's trees are those that succeeded abandoned pastures and farm fields. Existing trees and vegetation are located along streets, on private lots, estates or institutional land, as well as in parks or conservation lands. These trees and vegetation constitute our urban forest, which requires intensive management. The Brookline Information Services Department has recorded 10,791 public street trees in Brookline (see Figure 3).

Trees are especially important in an urban setting. They provide valuable services and shape the character and livability of the Town. The American Forestry Association estimated that an average 50-year old tree provides \$57,151 of services over its life based on a quantification of the many benefits.

While trees beautify and enhance the character of Brookline in all areas of the Town, the European beeches planted on Longwood

Mall by David Sears in 1848 are probably the most magnificent. Sears is credited with planting 14,000 trees in Brookline, and other individuals have contributed trees as well as funds for tree planting and care.



Longwood Mall, 1999

Putterham Woods contains acres of mature eastern hemlocks through which trails wind; the D. Blakely Hoar Sanctuary is an excellent example of a red maple swamp and also boasts some significant trees that are over 100 years old; the Lost Pond Conservation Area and MDC reservation include white cedar and black spruce. Today's dominant trees are various species of oaks and maples, white pine, and eastern hemlock.

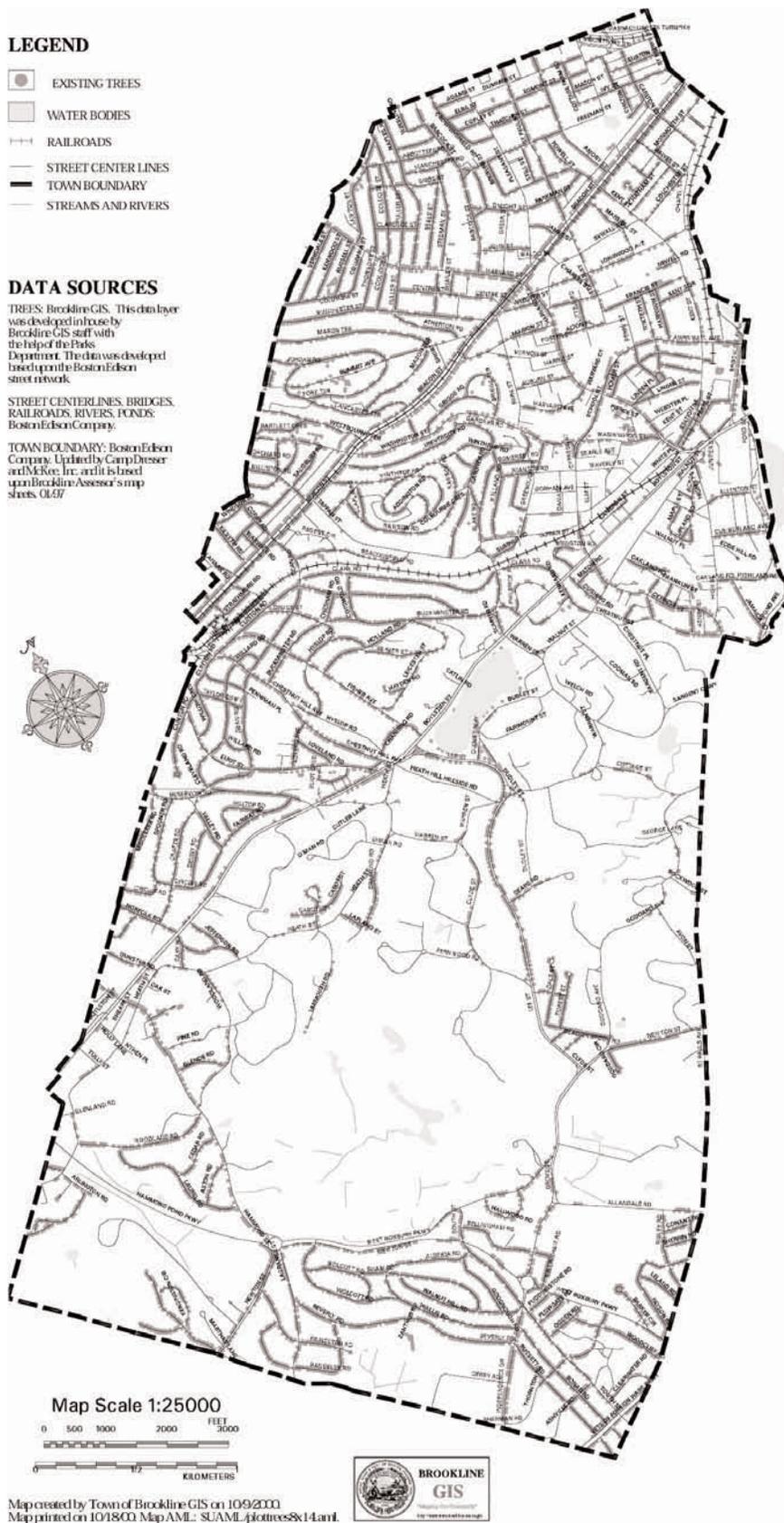
DISEASE/PESTS

The composition of the urban forest has also been altered by the effects of tree diseases and pest infestations. The grand American Chestnuts were virtually exterminated by

Chestnut Blight, a fungal bark disease.

EXISTING PUBLIC STREET TREES

FIGURE 3



The American Elm has been decimated by another fungal disease spread by a beetle, which is thought to have been unknowingly brought from Europe. Another tree pest that dramatically affects the urban forest is the Gypsy Moth. The Gypsy Moth periodically causes widespread defoliations but fortunately, effective biological agents are available to control it.

The Town of Brookline is currently experiencing a major infestation of the Hemlock Woolly Adelgid (HWA). The HWA was accidentally imported into Virginia from Asia and has been slowly making its way up the eastern seaboard with devastating results in forest populations.

The Importance of Urban Trees

Mitigate Air Pollution

Trees filter particulates (e.g., dust, ash, pollen, smoke), extract significant amounts of automobile pollutants such as carbon monoxide and sulfur dioxide, and return oxygen to the air.

Conserve Energy

Trees cool the urban environment in summer by providing shade and humidifying the air via the evaporated moisture through their leaves. In winter, deciduous trees allow sunlight to pass through and heat our buildings. An additional benefit to homeowners is the savings in energy expenditures. Studies have shown that well-positioned trees can save homeowners 20 to 25 percent in energy costs compared to houses in treeless areas.

Moderate Climate

The cooling effect, plus the windbreak effect created by trees, moderates the harshness of the urban environment. Well-placed masses of trees reduce wind speed, which makes an important difference for pedestrians, particularly when icy conditions exist. In summer, trees reduce the heat island effect caused by bright sunlight reflecting off pavements.

Increase Property Values

The value of residential property is raised by the presence of trees. The U.S. Forest Service estimates that the market value of homes is increased from 7 to 20 percent by trees. Clearly, the financial benefit to property owners depends on the specific number and condition of trees on the property.

Create Wildlife Habitat

Trees provide food, nesting sites, and shelter for urban wildlife, especially birds. The presence of wildlife contributes an unquantifiable value to the quality of life in urban areas. Bird songs in spring and summer and the pleasure to the elderly and young of feeding birds and squirrels enriches city life.

Improve Quality of Life

Urban residents can more fully and enjoyably experience the change of seasons, the cooling effects of shade, and maintain a connection to the living world. Trees are also serve as a learning source for students who can study living natural science rather than an abstraction.

Reduce Noise

Trees absorb and deflect some of the noise generated by urban residents and can also visually screen residents from the source of street noises.

Control Stormwater

Rainfall is intercepted by trees, allowing precipitation to infiltrate and become absorbed by vegetation. Trees also transpire the water back into the air. These natural functions reduce the volume and rate of runoff to street drains and waterways, resulting in less flooding and sedimentation of waterways. The greater the area covered by tree canopy, the greater the amount of stormwater attenuation.

ISSUES & OPPORTUNITIES

While Brookline's park, open space, and greenway system is extensive and well established, through analysis of the existing system and its historical development, a number of potential issues and opportunities emerge that must be considered as part of this plan. In general, there are many issues and opportunities, not only in terms of open space preservation, but also for the renovation and redesign of existing facilities. This section identifies eight major categories of issues and opportunities: open space protection & parks management; development review, policies, & regulations; maintaining & establishing greenways; restoration of the Muddy River & Emerald Necklace; urban forestry; stewardship & environmental education; commercial centers; and funding.

Protecting Open Space

1

PRIORITIZATION

Brookline has a number of significant open spaces that currently are held privately without restrictions on their development. Despite the fact that these spaces are not accessible to the public, they contribute to the Town as visual space and as urban forest resources that are important to the appearance of the Town and its general environmental quality. Many are also critical links in greenway corridors providing wildlife habitat and promoting species biodiversity.

Some prime examples of significant privately-held open spaces include Allandale Farm, the last remaining working farm in Boston and Brookline, and other large wooded areas in South Brookline such as those found at Pine Manor College and the Chestnut Hill Benevolent Association. In dense North Brookline, wooded property adjacent to Hall's Pond Sanctuary and Amory Woods is privately held with no agreements to constrain development.

Another key open space parcel is the abandoned MWRA reservoir, at the top of Fisher Hill which was last used in 1954.

Discussions have been initiated with the MWRA regarding the use of the site and its possible transfer to the Town for open space.

Since the publication of the 1994 Open Space Plan, development has continued to diminish the amount of open space in Brookline, resulting in the loss of over 30 acres. Conversely, during this period only nine acres of land have been added to protected status: a one-acre parcel in the Sargent Estates donated to the Brookline Conservation Land Trust; a two-acre conservation restriction on woodland behind the Goddard House Development; and a six acre preservation/conservation restriction at the Longyear condominium property on Fisher Hill.

The open space inventory indicates that 653 acres, or 56 % of the Town's open space, is legally unprotected. Key parcels at risk need to be identified and, then, prioritized based on the following factors:

- * potential to be developed
- * ecological value
- * linkages to other open space parcels
- * enhancement of existing protected areas
- * preservation of visual resources
- * potential for public access.

Implementation of the Charles-to-Charles Corridor, Olmsted Master Plan, and bicycle access improvements are issues that require inter-town coordination.



Allandale Farm, 1999

Effective inter-town relationships can be achieved. For example, under the direction of the DPW and Board of Selectmen, Boston and Brookline are currently working together to implement a plan for cleaning up the Muddy River and restoring the Emerald Necklace. Regional planning helps the communities work together to reach common goals.

ID TOOLS FOR PRO-

TECTION

There are a number of standard open space protection tools that can be implemented including: conservation restriction, purchase of development rights, bargain sale, limited development, family limited partnership, charitable remainder trust, and land donation. We have the opportunity to explore the Town's role in promoting use of these tools and to identify any additional tools that could be used to protect open space and town character.

Development Review, Policies, & Regulations

The protection and improvement of open space, in part, is one that is addressed by the Zoning By-law, Subdivision Regulations, State Wetlands Protection Regulations, and Historic Preservation Regulations. In different ways, these Town by-laws intend to preserve open space, in terms of quantity and quality, as new development occurs.

The Zoning By-law, in particular, affects the amount and quality of open space on private parcels. The current Zoning By-law, which was first adopted by Town Meeting in May 1962, has five major regulations directly affecting open space: lot size minimums, setbacks, landscaped and usable open space, cluster subdivisions, and public benefit incentives.

Under Section 5.00, new residential developments (and some other types of development in residential districts) are required to provide on-site landscaped and usable open space as a specified percentage of gross floor area of the proposed building or addition.

Also under Section 5.00, front, side, and rear yard setbacks are required for new developments and additions.

Section 5.11 permits cluster subdivisions, which allow more flexibility in site design in return for permanent open space protection. Some of the cluster developments in Brookline include: Fisher Hill at 535-575 Boylston Street, 335 Goddard Avenue (townhouses across from Larz Anderson), The Friary at 49 Rawson Road, Healy Gardens at 131 Newton Street, Longyear - 120 Seaver Street, and 830 Newton Street.

There are also floor area ratio and height incentive provisions in sections 5.21 and 5.32 of the By-law in return for public benefits, including public open space or maintenance of Town open space.

CONSERVATION SUBDIVISION DESIGN

The Metropolitan Area Planning Council (MAPC) has recently published a guidebook for Conservation Subdivision Design By-laws. The guidebook is intended to assist communities in developing a by-law that minimizes the total amount of disturbance on a site and allows greater flexibility and creativity in design of residential subdivisions.

Over that past decade (1990-1999), 79 new lots have been created in Brookline through subdividing existing lots (see Chart 3). Sixty-five percent of those subdivisions have occurred in the past five years.

The Town could consider revisions to the existing cluster provisions of Brookline's Zoning By-law to incorporate ideas presented in the MAPC guidebook mentioned above.

OFF-SITE IMPROVEMENTS

The Town could investigate ways to increase the direct participation of developers in the provision of open space and recreation resources. Agreements to underwrite park improvements, tree planting, and open space protection could be recommended by the Planning Department during the permitting process as a form of environmental impact mitigation.

In many areas of Town, there is little recreational public land and insufficient vacant space to meet the need for neighborhood recreational facilities. In such cases, the Town could seek public and private opportunities to create open space.

BUFFER ZONES

Visual encroachment on open spaces is a concern. Until 1973, developers were given height bonuses for constructing buildings near public parks. That bonus was eliminated and buffer zones of lesser height were established around public

open spaces in S, SC, and T zoning districts. Park and conservation land set backs should be established to grant review authority to the Conservation Commission or Park and Recreation Commission for any development within 100-feet of a park or sanctuary.

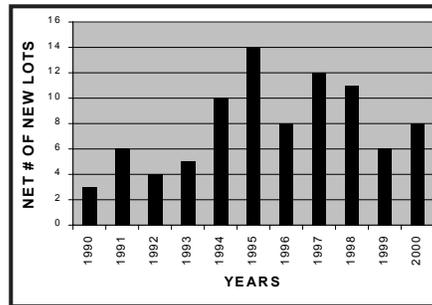
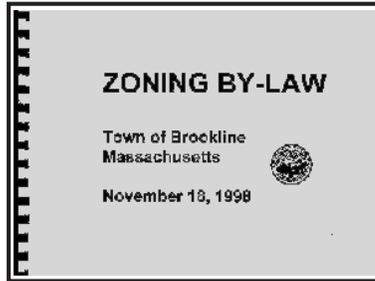


CHART 3

Source: Brookline Department of Planning & Community Development, compiled October 2000

Given the significant values served by greenways, the Town has the opportunity to adopt a policy of protecting greenways. Greenways, which are open space corridors connecting neighborhoods, positively impact individuals and improve communities by providing not only recreation and transportation opportunities, but also by influencing economic and community development.

Greenways preserve important natural landscapes, provide needed links between fragmented habitats and offer tremendous opportunities for protecting plant and animal species. During preparation of the Open Space 2000 Plan, a Greenways Working Group identified some potential greenways (see figure 4).

CHARLES TO CHARLES CORRIDOR

The most important resource greenway in Brookline is the Charles to Charles Corridor. Since adoption of this corridor in 1975, Brookline has worked to acquire conservation restrictions within the middle segment of the corridor. However, important parcels continue to remain unprotected. Conservation restrictions, with some form of public access, are needed. Also, collaborative planning and cooperation with Boston and Newton needs to be reinvigorated.

The Massachusetts Executive Office of Environmental Affairs, the Emerald Necklace Conservancy, federal and state agencies, and citizens groups have reinvigorated the Muddy River restoration project, which is a portion of the Charles to Charles Corridor. After years of study and debate involving a multitude of citizens groups and public agencies, progress is being made toward resolving the severe problems plaguing the Muddy River and adjacent areas in Boston and Brookline.

Early in 1999, the Town joined the City of Boston, under the Massachusetts Environmental Policy Act, to jointly review a plan for cleaning up the Muddy River and restoring the Emerald Necklace. The partnership has submitted an Environmental Impact Report, chosen consultants for project engineering and oversight, and is currently working towards the preparation of an Environmental Impact Statement. A citizen advisory committee was assigned to provide input to and review progress on the project.

STREETS & PEDESTRIAN PATHS

A number of streets and paths are indicated on figure 4 that are potential access or scenic greenways. Beacon Street, a historic boulevard designed by

Frederick Law Olmsted, is the major entrance to Brookline and is an example of an access greenway. However, majestic trees that once lined the boulevard are gone and the median strip where the trees stood has been steadily eroded by traffic modifications. Beacon Street needs a comprehensive streetscape restoration that will coordinate tree planting, landscaping, parking areas, the MBTA tracks, and treat the boulevard as a linear open space or greenway linking many of Brookline's neighborhoods.

Boylston Street also serves as a major entrance and throughway that influences the visual character and perception of Brookline. Boylston Street (Route 9) needs a cohesive streetscape plan that incorporates benches, trees, and walkways to create a pedestrian and bicycle experience that is pleasant, safe, and inviting. Such improvements will not only benefit travellers and enhance street aesthetics, but can also stimulate business.

Figure 4 also identifies Brookline's pedestrian paths with open space connections, labeled "Urban Trail" as a potential greenway. This innovative system of paths and open space is located on three major hills: Corey, Aspinwall, and Fisher Hills. The creation of these paths seem to be attributable, in part, to Frederick Law Olmsted. The paths were created perpendicular to the roads, providing ideal short-cuts for pedestrians.



Leverett Pond, 1999

NEIGHBORHOODS

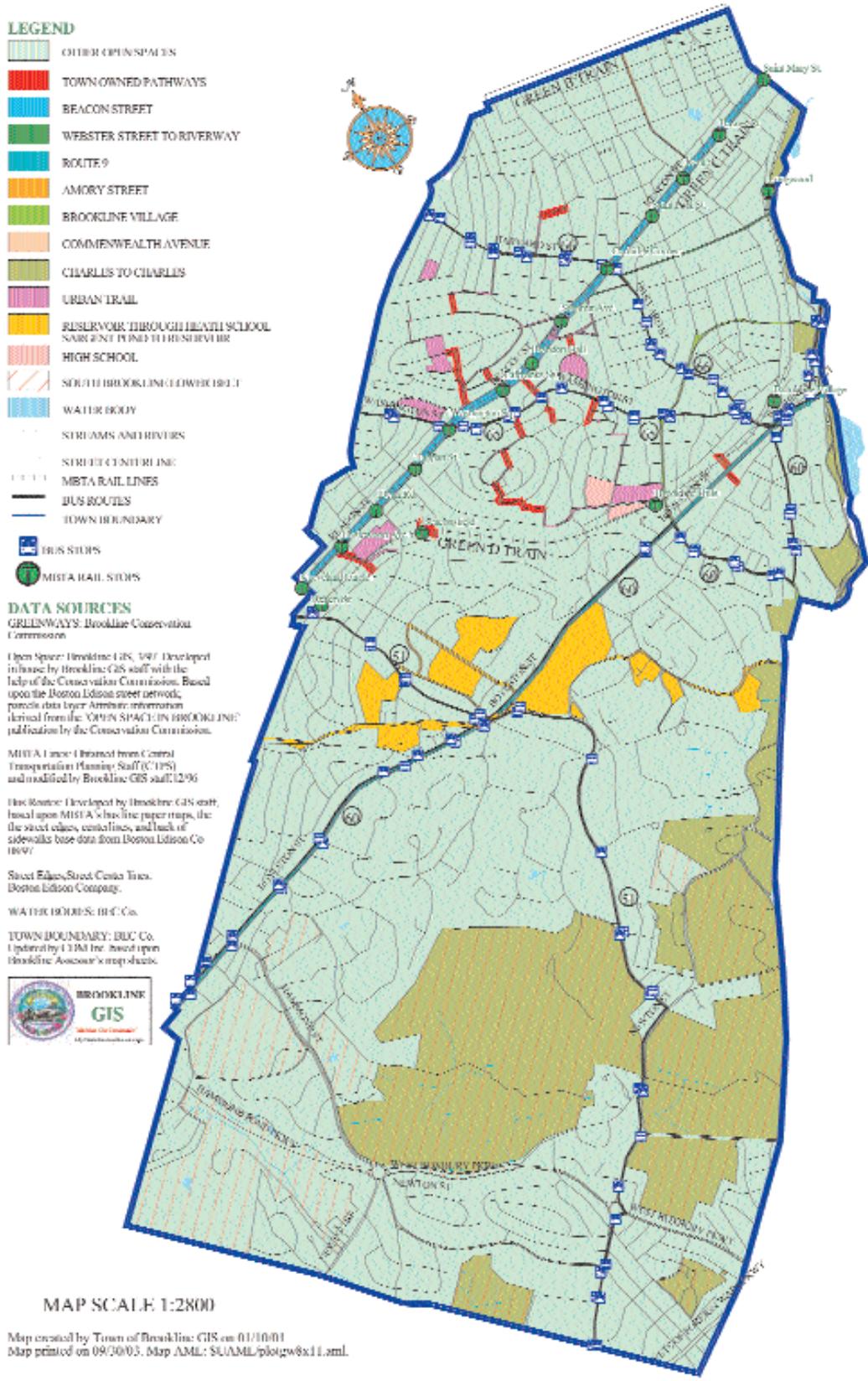
There is also an opportunity to connect open spaces in the Cottage Farm neighborhood such as Knyvet Square, Winthrop Square, Mason Square, and the remainder of the Boston University parcel at 50 Amory Street. While these open spaces are separated by dense development, it is possible to conceive of visual connections through tree-lined streets and improved pedestrian and bicycle access.

PROTECTION TOOLS

The possible tools to use for protection of greenways overlap with the tools listed for protection of open space (e.g., conservation restriction, purchase of development rights, etc. . .). The tools would need to be used in targeted ways that would protect the greenways strategically. Another protection tool that could be effective in protecting greenways is the creation of an overlay district that could perhaps mandate or strongly encourage, through incentives, use of the conservation subdivision (discussed previously).

POTENTIAL GREENWAYS

FIGURE 4



Stewardship & Environmental Education

STEWARDSHIP & MANAGEMENT

It is unlikely that significant areas of open space will be created by demolishing buildings, therefore, it is important to effectively manage Brookline's existing parks system. The concept of stewardship guides us to to protect, preserve, enhance, and manage the natural, cultural, and historical resources of our open space system so that the full value is passed on to future generations.

In the recent past, the parks and open space function of the Town has been largely reactive rather than proactive. Long deferred maintenance created a continuing cycle of renovation and reconstruction and the funds invested in capital improvements were not supported with appropriate maintenance practices and funds.

Although the oversight of Town parks and open space areas has increased dramatically over the past five years, to sustain or improve conditions will require even greater focus and dedication from all stakeholders.

Faced with a smaller budget and fewer workers, the challenge of maintaining a healthy open space system is formidable.

The Town needs to plan for preventive maintenance and timely rehabilitation of open space resources, pursue state, federal, and private funding to supplement Town resources, and ensure that open space facilities will not be used in excess of their capacity. In order to make the most efficient use of limited resources, and for more effective decision making, the actual cost of maintaining open space facilities needs to be projected. Examples of this stewardship approach to management include enhancing soil conditioning and turf maintenance at parks and playfields to improve safety and durability; further development of integrated pest management (IPM) strategies to reduce the costly application of pesticides

while mitigating their environmental impact, and developing a tree and shrub selection program that targets environmentally tolerant, disease resistant, and low maintenance varieties.



Lawton Playground, 2000

One of the most complex management questions is how to deal with open space issues that extend beyond the Town's borders. Mechanisms to make communication and coordination between the Town and the cities of Boston and Newton need to be created to ensure that mutual interests are addressed in a timely and orderly fashion.

EDUCATION

Our open spaces provide ideal classrooms for students of all ages to learn lessons in biology, ecology, and environmental science. Educational programs such as natural history walks, bird walks, invasive species workshops, botany workshops, and open space tours enhance public appreciation of our open space resources. Community and teacher workshops that make use of the sanctuaries as outdoor classrooms are currently offered to students, but additional efforts should be made to incorporate conservation areas and parks into the school curriculum.

The School Department should continue to build environmental curriculum from kindergarten through high school. Environmental literacy needs to be developed along with other intellectual skills.

To the degree that students can be educated to better understand nature, the Town will be better able to manage environmental challenges such as recycling, water conservation, toxic waste reduction, biological conservation, and air quality. Strengthening the cooperative relationship between the School Department and the Conservation Commission can enhance current curriculum that features water ecosystems, pollution, animal behavior, botany, habitat, and food webs.

Urban Forestry

Brookline's network of street trees is one of the oldest and best established in the country. In addition, the Town's parks and sanctuaries are home to thousands of trees.

The DPW Division of Parks & Open Space, the Tree Planting Committee, and the Conservation Commission are working to maintain the Town's urban forests with diminishing resources. The Town's goal is not only to beautify the Town streetscape, but also to add variety and increase longevity. This entails substantial effort by Tree Planting Committee members and the Town. Once planted, tree identification numbers are assigned and added to the Town's Geographic Information System (GIS).

MANAGEMENT & EDUCATION

It is clear that in the future public/private partnerships will be needed to assist the Town in planting and maintaining trees. Additional efforts will be required to map the non-street tree component of the urban forest and integrate this information into the management system.

Additional education efforts would help raise the awareness of the value of trees and spur planting and maintenance activities on private property. A tree protection by-law would discourage tree removals on private land and maintain the integrity of the urban forest.

INSECT INFESTATION

The Town of Brookline is experiencing a major infestation of the Hemlock Woolly Adelgid (HWA).

The Woolly Adelgid is an insect that feeds on the needles of Eastern and Carolina hemlocks. Heavy infestation causes needle loss and ultimate mortality of the tree. The Hemlock Assessment Committee was created in the spring of 1999 by the Park and Recreation Commission to research the effect of the Woolly Adelgid insect pest and potential action that the Town should take to protect its priority trees.

There are approximately 3,380 Eastern Hemlock trees located on Town owned properties that are susceptible to this parasitic insect. Natural stands of Hemlocks occur at Baker School, Dane Park, D. Blakely Hoar Sanctuary, Larz Anderson Park, Public Works Municipal Center, Putterham Woods/Golf

Course, Soule Recreation Center, and Walnut Hills Cemetery. The tree is also found on many private properties throughout Brookline.

Based upon cost, proximity to wetlands and expected success of treatment, control measures were taken to curb the spread of the insect, including spraying and trunk injections in several selected areas throughout Town.

However, it is anticipated that many of the trees in large stands will have to be left to die either because they are already too infested or are too difficult to access for treatment.

While tree plantings should be maximized, efforts should also be made to provide diverse habitats, including meadows and thickets since the variety of plant communities ensures an abundance of wildlife and visual experiences.



The Reservoir, 1999

Commercial Centers

Brookline's commercial centers are the centers of business and civic activity, as well as centers for surrounding residential neighborhoods. It is important to recognize the opportunity to address streets and sidewalks not only as transportation amenities, but also as public places. It is also important to recognize where opportunities exist to create and improve civic places for people to enjoy, since these civic places can enhance both commercial and residential districts.

As part of the Economic Development Office, a Commercial Areas Program has been created. An important part of its mission will be to pursue opportunities between the Town and business interests to enhance and create civic spaces to green our commercial areas. This works hand in hand with other programs to attract businesses and facilitate overall commercial area improvements.

There are no major civic places in Brookline's com-

mercial centers, such as in Coolidge Corner, Brookline Village, and Washington Square. Civic places are open spaces that are integrated with commercial centers and designed for people to passively enjoy. One civic place in Brookline is the Town Hall Plaza.



To enhance the vibrancy of our commercial centers, it is important to incorporate civic places into the fabric of the centers for store patrons, neighborhood residents, employees, and visitors to congregate in and enjoy.

Incorporating well-designed and well-placed civic places into our commercial centers can strengthen the cohesiveness of these centers, just as parks do for our residential neighborhoods.

There is a compelling opportunity in Brookline to identify locations and funding resources for creating major civic places in our commercial centers.

TOWN RESOURCES

Brookline will continue to be faced with difficult decisions in establishing priorities when considering potential capital and operational needs for parks and open space.

Successive Town administrations have recognized the diminished funds and personnel of the Parks Department and have delegated assistance to parks from other Public Works divisions. Since FY92, the budget resources devoted to Open Space have stabilized and risen slightly. In FY 99, in response to the findings of the Selectmen's Task Force on Open Space, funds for a landscape design professional, staff training, forestry restoration, and turf maintenance have been added. This has created a visible improvement in the condition of Town open space and it is important that these efforts continue.

The Selectmen's Task Force on Open Space hired a consultant to determine how Brookline's open space expenditures related to other eastern Massachusetts communities. In general, data comparing expenditures of Brookline with Arlington, Cambridge, Newton and Wellesley indicated that Brookline's expenditures appear to fit into the middle of this group. Brookline is second to Cambridge in expenditures per acre and second to Wellesley in expenditures per capita. Brookline has the largest ratio of

school children per recreational acre of these communities, indicating a high level of need for field maintenance.

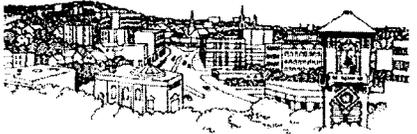
Alternatives for enhancing open space maintenance and improvements need to be considered, including additional budgetary resources and more productive methods of delivering services.

PRIVATE FUNDING

Much of Brookline's open space system is the result of the past generosity and foresight of its private citizens. Several parks and open spaces were given to the Town for the use of the public including Larz Anderson Park, Longwood Mall, Knyvet Square, Winthrop Square, Mason Square, D. Blakely Hoar Sanctuary, and the MDC Lost Pond Reservation. Tree planting has also been supported generously by private citizens through special gifts and bequests.

Mechanisms exist in Town to facilitate private financial support for open space. The Brookline GreenSpace Alliance, Conservation Fund, Brookline Conservation Land Trust, and dedicated Town funds are vehicles for private financial support of parks, recreation facilities, and conservation areas. The funding opportunities that these and other organizations provide need to be actively sought.

WATER QUALITY MANAGEMENT



BROOKLINE
COMPREHENSIVE PLAN 2005-2015

issues & opportunities report

INTRODUCTION

Protection and management of our local and regional water resources must continue to be one of the critical issues to be addressed by Brookline and the metropolitan Boston region.

Historically, our region's water resources have been essential to our economy and quality of life. Today, ongoing efforts to pursue strategies that sustain and restore these irreplaceable water resources will continue to be a high priority requiring ongoing partnerships with federal, state and regional water management agencies and interests. Efforts now underway in Brookline and the surrounding metropolitan area are achieving long term goals that will insure that future generations will enjoy access to clean water and healthy watersheds.

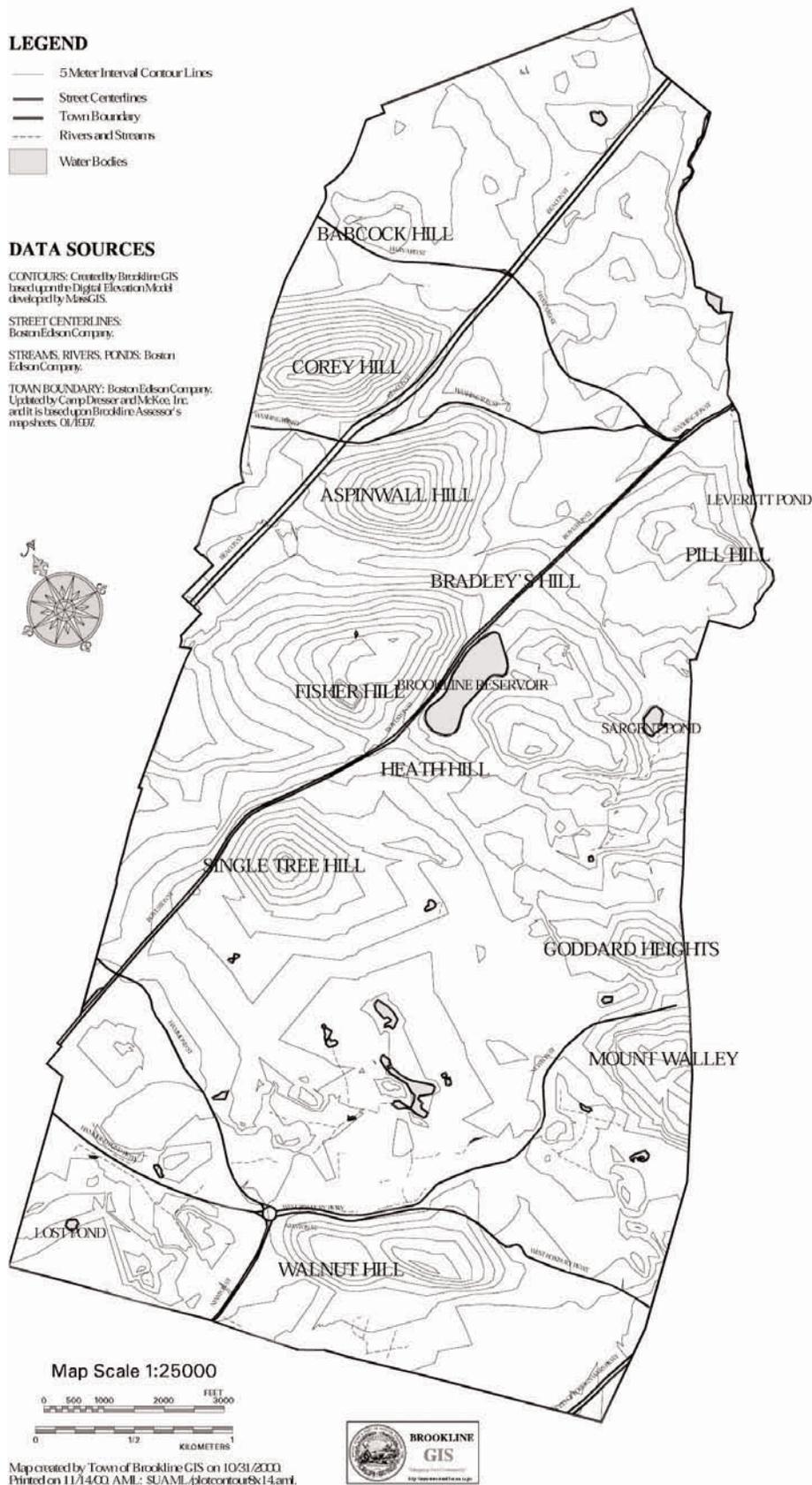
The following report defines the elements of our local and regional water resource systems, important management efforts now underway and key issues and opportunities that must be considered by the Comprehensive Plan. The report focuses on both the natural water resource systems, particularly the Charles River Watershed, ground water, streams and ponds, and floodplains and wetlands, as well as storm water management and related infrastructure systems.

The following key plans and studies have provided the underlying research and basis for this report.

- (1) Town of Brookline Stormwater Master Plan, prepared for the Department of Public Works by BETA Engineering, Inc., November 1999.
- (2) Open Space 2000, Analysis and Plan for Brookline Conservation, Parks and Recreation, Conservation Commission, February 2000.
- (3) MetroPlan, Metropolitan Area Planning Council, May 1990
- (4) The report also incorporates issues and opportunities identified by Brookline Conservation Commissioner Kate Bowditch, watershed hydrologist with the Charles River Watershed Association, and former member of the Emerald Necklace Master Plan CAC.



Data Source: Digital Orthophoto Images, MassGIS, December 1995



THE EXISTING SYSTEM

Originally named The Hamlet of Muddy River after the local river that separates us from parts of Boston, Brookline has an important appreciation for local water resources. Historically relied on for drinking water; Brookline water resources have become exceptional recreational and visual amenities and create important natural habitats for animal and plant life.

Water Resources

Charles River Watershed

Brookline is located entirely in the Charles River watershed or Drainage Basin and Coastal Drainage Area, as defined by Massachusetts Surface Water Quality Regulations. The Charles River watershed comprises approximately 308 square miles within the Boston metropolitan area, of which Brookline comprises 6.8 square miles. Surface water drainage within the watershed is influenced by topography, street and utility infrastructure and land use patterns.

There are twelve major drainage areas within the Town of Brookline (See Figure 2). Seven of these discharge directly into the Charles River, four into the Muddy River, and one into Stoney Brook. Discharge occurs through pipes, streams, and ponds. The overall drainage system consists of 101 miles of drain pipe and open channels and 11 miles of combined pipe. The Town's Stormwater Master Plan provides a complete description and assessment of each of the drainage areas.

Groundwater

Groundwater flows are determined by the shape and the slope of bedrock, and by the type of soils overlying the bedrock. Brookline is typical of the region, having soils that are a complex mix of glacial drift deposits. Groundwater is typically found in sand and gravel deposits. In general, groundwater flows tend to follow surface water drainage divides, but where surface water has been diverted, this may not be the case. Groundwater contamination, which poses threats to surface waters when it migrates toward ponds and streams, or into storm drains, has been identified in some locations. Historically, groundwater resources were important to Brookline as a source

of drinking water. Today, the Town is a member of the Massachusetts Water Resources Authority, and obtains all of its drinking water from the Quabbin Reservoir system in western Massachusetts

Streams and Ponds

Historical maps of Brookline show nine major stream systems in addition to the Muddy River. Most of these streams have been placed in pipes and are no longer visible. Those that are visible have been altered by channelization for agriculture or mosquito control. Segments of South Meadow Brook, Sawmill Brook, and Village Brook are still open.

The 1641 map indicates that there were six ponds and no lakes in Brookline. After the arrival of the colonists, additional ponds were created for water supply and agriculture. It is not possible to determine which of the remaining six ponds are natural or man-made; today, only Lost Pond and Hall's Pond remaining. Hall's Pond has been reduced in size by filling and Lost Pond is gradually shrinking due to eutrophication. Sargent's Pond, Larz Anderson Park Pond, and the Brookline Reservoir are the major bodies of surface water that have been added. Small ponds also exist at The Country Club, Putterham Meadows Golf Course, and Allandale Farm. Willow Pond in the Emerald Necklace is shared with Boston. (See Figure 1.)

Wetlands and Floodplains

At the time of European arrival, wetlands (i.e. swamps, marshes, wet meadows) were prevalent and large expanses of marsh existed along the Muddy River. The name of Cedar Swamp in the Cottage Farm area implies that it was an Atlantic White Cedar

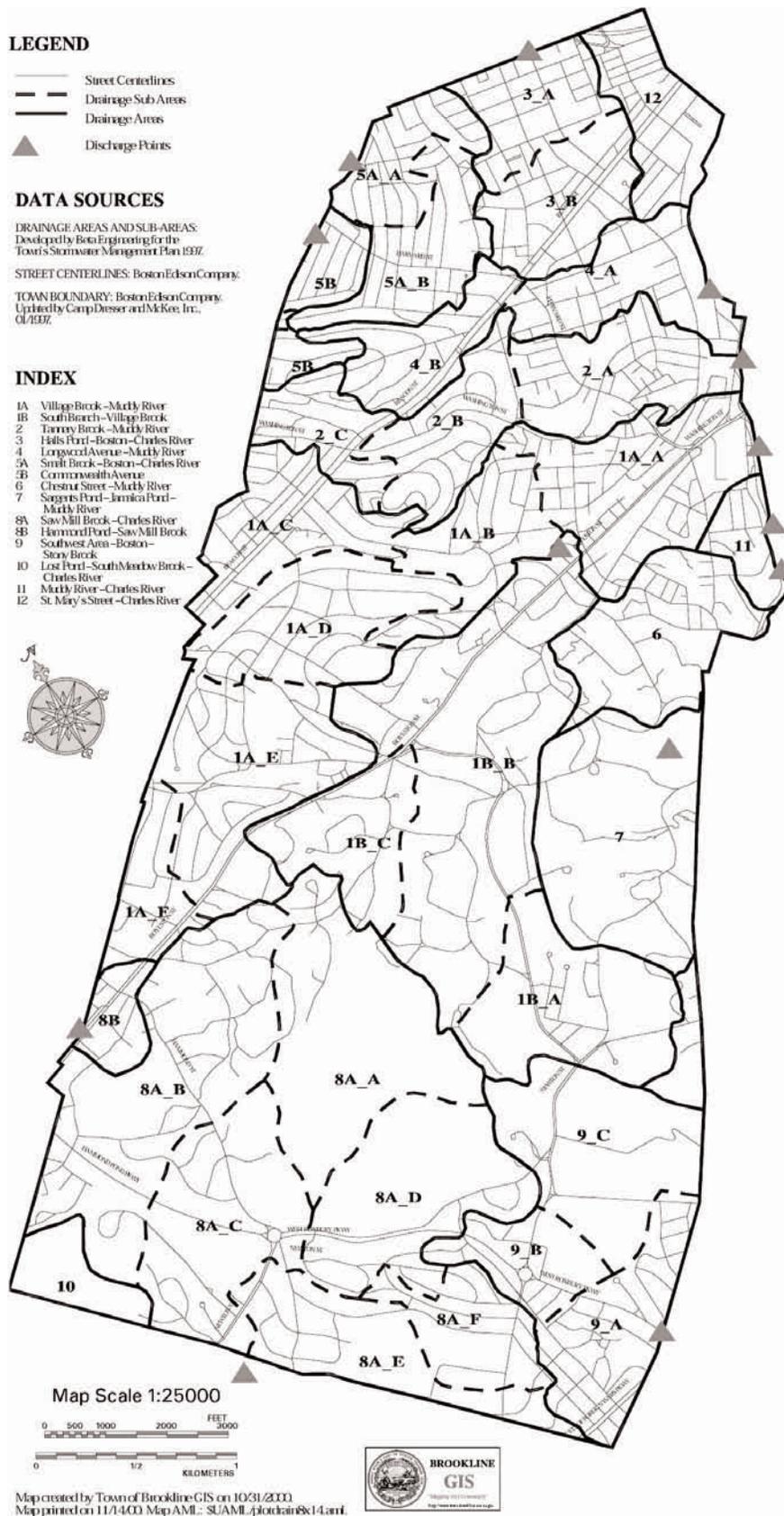


Regional Watersheds in Boston Area

Data Source: Executive Office of Environmental Affairs Web Site (www.state.ma.us/envir/map.htm)

DRAINAGE AREAS

FIGURE 2



Swamp, which is today a rare ecosystem in Massachusetts. Putterham Meadows was also an extensive area of marsh and swamp. Many parks such as the Emerald Necklace Park, Griggs Park, Longwood Playground, and Amory Playground were constructed on former wetlands.

Since most development in Brookline preceded the enactment of statutes created to protect wetlands, large areas of these important resources were filled.

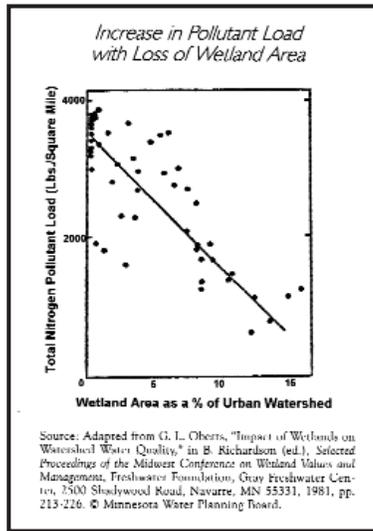
Today, the major vegetated wetland systems are located at Hall's Pond, Lost Pond, D. Blakely Hoar Sanctuary, Allandale Farm, Sargent's Pond, along Hammond Pond Parkway, and at Putterham Meadows golf course. While the area has been significantly reduced, wetlands continue to provide important functions including flood control, storm damage prevention, pollution attenuation, and wildlife habitat.

Floodplains are those lands

along streams and ponds into which high water spills during and after storm events. The major floodplain in Brookline is associated with the Muddy River.

For flood insurance and regulatory purposes, the boundary of floodplains is generally defined as the elevation of flooding resulting from the 100-year storm. This is a statistical storm which assumes that seven inches of rain will fall within 24 hours. The probability of such a storm occurring in any given year is one percent, or once every hundred years.

In addition to the Muddy River floodplain, areas around Sargent's Pond, Longwood Playground, Putterham Meadows Golf Course, and Hall's Pond are mapped as 100-year floodplains. (See Figure 3.) Brookline participates in the Federal Flood Insurance Program, which provides subsidized flood insurance for property owners.



Data Source: Ewing, *Best Development Practices*, 1996, pg.101

Infrastructure

Stormwater and Wastewater System

The Town of Brookline's stormwater collection system consists of approximately 112 miles of pipeline (101 miles of drain and 11 miles of combined sewers), 2,200 manholes, and 2,500 catch basins. The system is constructed of pipes and culverts in sizes ranging from 6-inch in diameter to 84-inch by 150-inch. The stormwater collection system is designed to collect and transport surface water from roadways, buildings and paved areas to outlets located at natural waterways. These waterways include the Charles River, Muddy River, Saw Mill Brook, and Stony Brook.

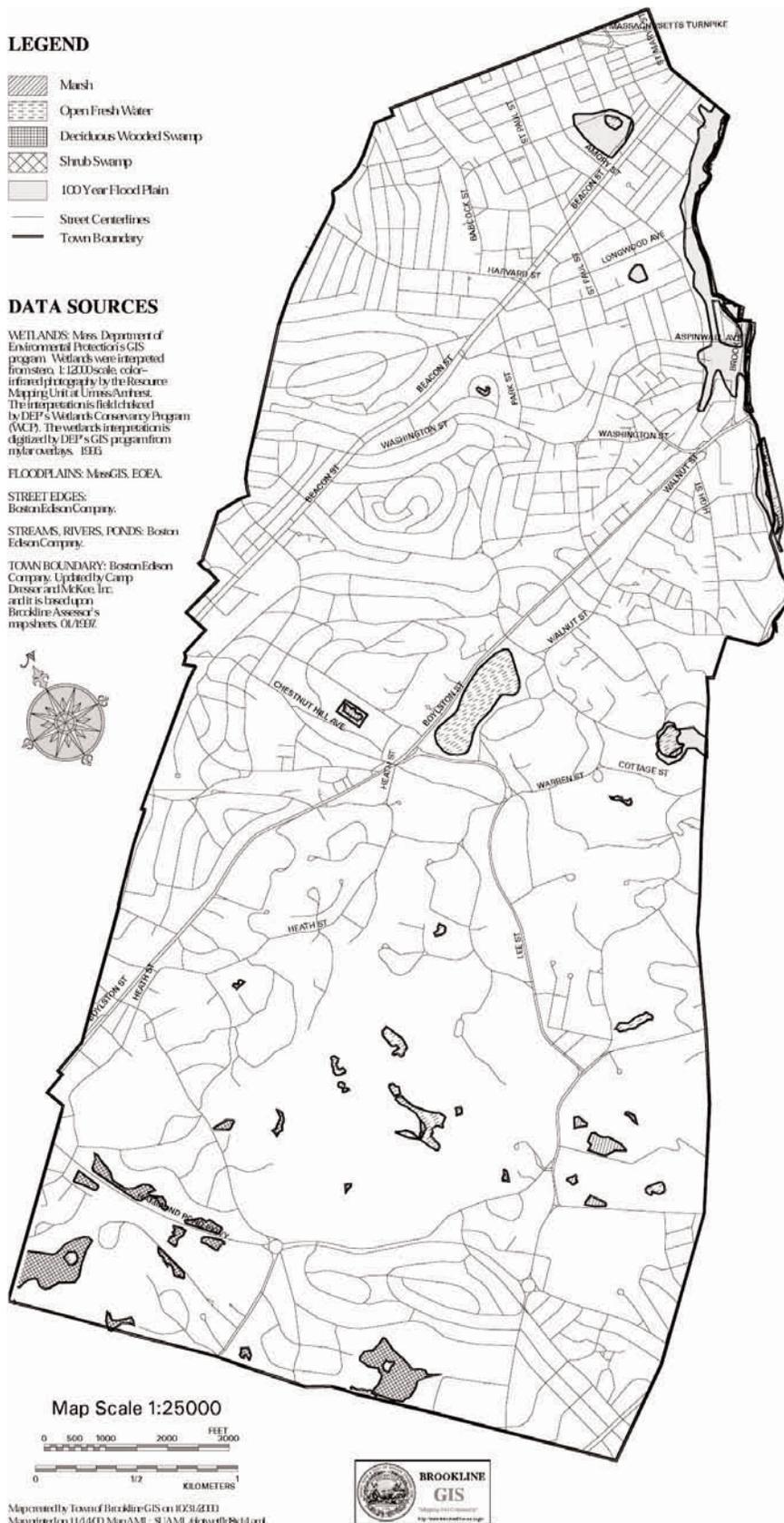
A large portion of the stormwater collection system was constructed between 1880 and 1930 and served as a combined sewer. These combined sewers were designed to collect and transport both sanitary flow and runoff from a rainfall event. Over the years, all but approximately 11 miles of the combined system has been separated into a sanitary sewer system and a stormwater (drainage) system.

Water Supply System

Brookline is a member of Massachusetts Water Resources Authority. Because elevations in the Town range from 7 feet to 340 feet above sea level, two separate distribution systems, Low Service and High Service, are required to provide water service to the entire Town. Without this arrangement, pressures would be extremely high in the low elevations and inadequately low in the high elevations of the Town. Static pressure in both systems is maintained between 20 and 120 pounds per square inch.

The Low Service System is supplied from two direct connections to the MWRA's Southern High Service System at Fisher Avenue. Water flow into the system is measured through two venturi meters owned and maintained by the MWRA. Distribution system storage is provided by two covered reservoirs on Fisher Avenue with a combined capacity of 7.7 million gallons. Although both reservoirs are maintained full for emergency supply, they are kept in reserve due to the MWRA's ability to maintain pressure through the direct connections. Both reservoirs, inlet and outlet piping and 4.8 acres of property are maintained by the Town's Water and Sewer Division. Low service distribution mains supply water to most sections of Town east of Washington Street and north of Boylston Street, representing 62 percent of the total water consumption.

The High Service System is supplied from two pumping stations on the MWRA's Southern Extra High Service System. Primary supply is made through a connection to the discharge piping of the MWRA's Reservoir Road pumping Station. In periods of high demand or other system emergencies, a secondary supply from the Newton Street Pumping Station can be placed on line. The purpose of both stations is to elevate the supply pressure to service the higher elevations of Brookline. Distribution system storage is provided at the highest land elevation in Town, Single Tree Hill, and consists of a 4.3 million gallon covered reservoir and a 1.7 million gallon steel spheroidal elevated tank.



ISSUES & OPPORTUNITIES

Through analysis of Brookline's water resources and existing stormwater, wastewater, and water supply systems, eight major issues and opportunities are identified in this section: stormwater management; Town by-laws & regulations; stormwater & water resource capital improvement program; Emerald Necklace Master Plan; wetland protection & restoration; non-point pollution; demonstration projects; and community outreach.

1

Stormwater Management

Consent Agreement

The U.S. Environmental Protection Agency has established a goal to improve water quality standards in the lower Charles River Basin by the year 2005. Between 1990 and 1995, the Town and EPA exchanged information on water quality sampling results to insure compliance with the Clean Water Act. Subsequently, EPA collected additional samples that revealed high levels of fecal coliform bacteria. In January 1995, the Town of Brookline and the US Environmental Protection Agency entered into a Consent Agreement to address stormwater management practices within the Town.

The Agreement required specific stormwater management practices to be implemented beginning in 1995 in order to improve stormwater quality discharge. The required stormwater management practices include the following:

1. Increase the average rate of street sweeping to twice per month
2. Increase the rate of street sweeping on main thoroughfares in commercial areas to three times per week
3. Increase the rate of catch basin cleaning on main streets and in commercial areas to twice per year at a minimum. This includes approximately 25% of the Town's 2,344 catch basins.
4. Begin a program to replace public wire basket trash receptacles with solid containers, to prevent dripping and blowing trash in order to improve stormwater quality. At least \$5,000.00 of municipal funds would be spent annually from 1995-1998.
5. Develop a volunteer program to stencil messages on catch basins warning residents not to dump materials down storm drains. At least \$5,000.00 of municipal funding would be expended for this program by the end of fiscal year 1996.
6. Develop a program to identify and remove illicit connections (cross connections) to the storm drain.

Stormwater Master Plan

In addition, the Town of Brookline completed a Stormwater Master Plan in 1999 to address the following issues:

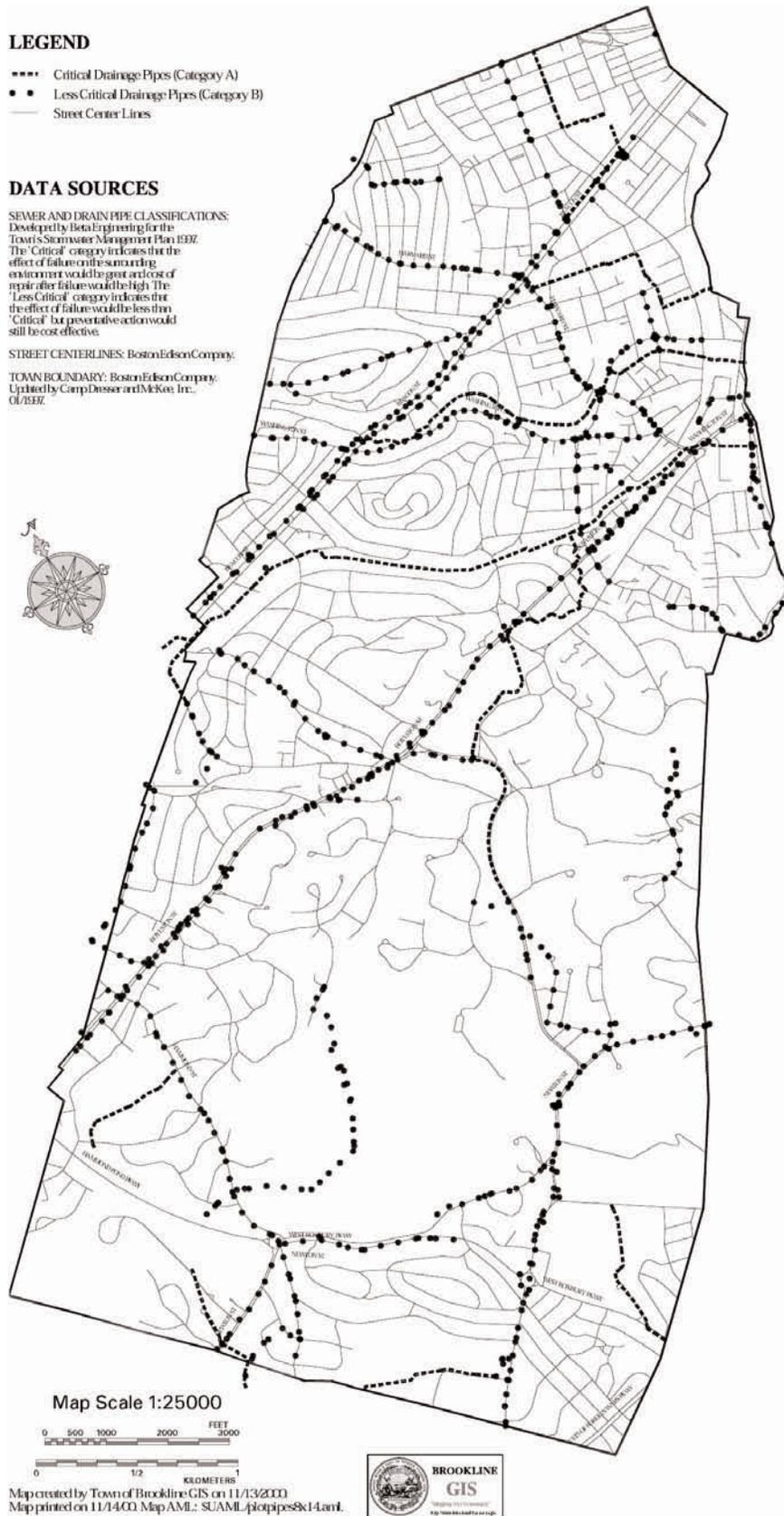
1. Evaluate the existing municipal stormwater management program.
2. Define stormwater system conditions to support maintenance and rehabilitation both system-wide and in concentrated critical areas.
3. Evaluate stormwater system capacity and define potential deficiencies and strategies including: Village Brook; Tannery Brook; Hall's Pond; Longwood Avenue; Saw Mill Brook; and Southwest Area. (See Figure 3.)
4. Propose improvements to the program, which could address stormwater quality discharged to the Charles River.

Implementation

The Town of Brookline is responsible for managing the collection, conveyance, and discharge of stormwater within its segment of the Charles River watershed. The Town's Department of Public Works (DPW) performs routine monitoring, inspections, and maintenance of the stormwater system. DPW is also responsible for regulating discharges to the stormwater collection system.

The Health Department plays a key role in investigating and regulating potential water quality violations that may impact public health and possibly result in contamination of the storm water collection system.

These responsibilities, together with the ongoing implementation of the Town's recently completed Stormwater Management Plan, are essential core elements of the Town's commitment to both rehabilitate and manage Brookline's stormwater system to insure conformance with regional, state and federal water resource protection goals and regulations.



4. Consider the potential application of special zoning overlay districts in critical drainage areas defined by the Town's Stormwater Management Plan to guide stormwater management improvements and practices associated with residential and commercial development and improvements.

5. Review and modify as warranted Zoning By-law open space requirements (Sec. 5.90-5.92) to address

issues related to impervious surfaces and landscape improvements that mitigate stormwater runoff.

6. Review and modify, as warranted, Town Vehicular Service Use Requirements, particularly as related to off-street parking design and layout, to institute best practices pertaining to stormwater management.

Stormwater & Water Resource CIP

3

The Town of Brookline, through its FY2001-2006 Capital Improvement Program, has allocated \$7 million in funds for storm drain and wastewater improvements to support implementation of the Stormwater Management Plan. Other committed CIP projects for the Muddy River, Willow Pond, Leverett Pond, and Hall's Pond will contribute significantly to

the restoration and preservation of Brookline's water resources. Continued capital investment will be an essential component of the Town's commitment to water resource management, conservation, rehabilitation and enhancement.

Emerald Necklace Master Plan

4

The success of the Emerald Necklace Master Plan will be closely linked to stormwater management practices and improvements pursued jointly by the Commonwealth of Massachusetts, Town of Brookline and City of Boston, particularly as related to the Muddy River Flood Control and Water Quality and Habitat Enhancement projects. The short and long term dredging and management projects proposed or committed for the Muddy River will address issues related to long term sedimentation that impact water quality, aquatic vegetation, and stream carrying capacity. However, the program should pursue an

equally aggressive commitment within the overall Muddy River watershed to mitigate stormwater flow and pollutants.

Best Management Practices tailored to the urban characteristics of the Muddy River watershed must be identified, evaluated, and initiated. Both structural and non-structural solutions could be considered including: sediment forebays; sediment chambers, particulate separators, or other buried sediment capturing devices; catch basin improvements; and improved street sweeping practices.



Leverett Pond

5

Wetland Protection & Restoration

The Town has made a major commitment to the implementation of the Master Plan for the Emerald Necklace, including an \$825,000 investment over the last three years to restore and improve the Olmsted Park and Riverway. In addition, the Town is proceeding with a \$710,000 investment in the remediation and restoration of Willow and Leverett Pond.

The Town has also made a commitment to initiate wetland habitat, stormwater and added improvement at Hall's Pond, D. Blakely Hoar Sanctuary, and Lost Pond within the next four years. The Lost Pond proj-

ect will involve a joint effort between the Town of Brookline, the City of Newton, and the MDC.

The Town will continue to pursue opportunities to maintain and restore our limited water resources. Partnerships between the Town, City of Boston, City of Newton, Commonwealth of Massachusetts will be essential to address these opportunities that are critically important to the Charles River watershed and our overall environment.

6

Control Significant Non-point Source Pollution

Stormwater is a major non-point-source of pollution. The Town has divided stormwater management responsibilities for right of ways and public facilities. It is critical to improve stormwater management on private property. A range of techniques may include: increasing stormwater storage and infiltration on-site; minimizing pollution sources such as excessive fertilization, herbicide and pesticide use; improving management of sites during construction; encouraging the

construction of grassed swales and tree planting; and preserving green space.

Creating incentive programs to help property owners, businesses and institutions retrofit their properties is also a cost effective stormwater management technique.

7

Demonstration Projects

Because watershed management is normally broad in scale and, thus, difficult to implement and evaluate, Brookline may wish to consider moving forward with demonstration projects at a small scale. Several sub-watersheds could be managed in different ways, with the effectiveness, costs, training, and maintenance requirements tracked to determine their effectiveness. Preliminary stormwater management design options have already been examined for some of the sub-watersheds in the Muddy River by both the Center

for Watershed Protection and the Massachusetts Community Assistance Partnership of the Natural Resources Conservation Service.

Private institutions could also volunteer to develop intensive stormwater management programs, and document their processes and results to help determine what types of public-private partnerships may succeed.

8

Community Education & Outreach

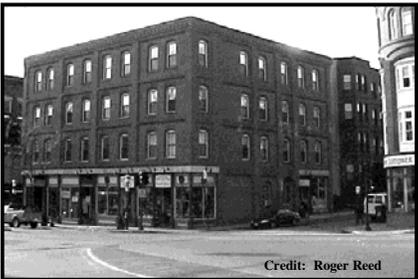
The Department of Public Works and Conservation Commission have initiated a community education and outreach program focused on actions residential and commercial property owners can take to minimize or eliminate the potential pollution of the Brookline stormwater drainage system.

Strategies to address household hazardous waste, runoff and erosion control, pesticides, fertilizers, and lawn care are recommended as ways to improve water quality. This important effort should be expanded to prevent further stormwater pollution.

HISTORIC PRESERVATION



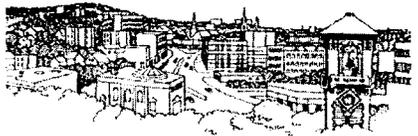
Credit: unknown



Credit: Roger Reed



Credit: To Be Determined



BROOKLINE
COMPREHENSIVE PLAN 2005-2015

issues & opportunities report

INTRODUCTION

Brookline has a rich and complex history that is reflected in its built environment and landscapes. These cultural resources are remnants of a shared past which has shaped Brookline's present and can inform the future. Together, these resources create Brookline's unique mix of urban, suburban, and rural places, and contribute to our strong sense of community.

Brookline's historic and cultural resources include residences, commercial buildings, schools, libraries, parks, cemeteries, estates, and farmlands, that together contribute to Brookline's overall townscape. Brookline has evolved over hundreds of years, creating distinctive and diverse neighborhoods and commercial centers that, in many areas, are compact, walkable, and connected to each other and to surrounding communities by a multi-modal transportation network.

At a time when communities throughout our region and the nation are struggling to recreate and restore neighborhoods and main streets based on traditional design principles, Brookline's existing townscape manifests these very principles. The preservation and enhancement of Brookline's townscape will be determined by how we plan for and execute the ongoing

design and conservation of individual buildings, districts, neighborhoods, and landscapes.

The purpose of this report is to identify key issues and opportunities to enhance Brookline's overall community character and to ensure the continuation of our unique townscape.

The following Historical Sketch outlines the physical and social evolution of Brookline. The Existing Historic & Cultural Resources section describes the extent of these resources and some of the existing methods and levels of recognition and protection. Issues and opportunities at the conclusion of this report explore a variety of means to guide the development of community goals, policies, and strategies to enhance and protect historic and cultural resources.

Historical Sketch of Brookline

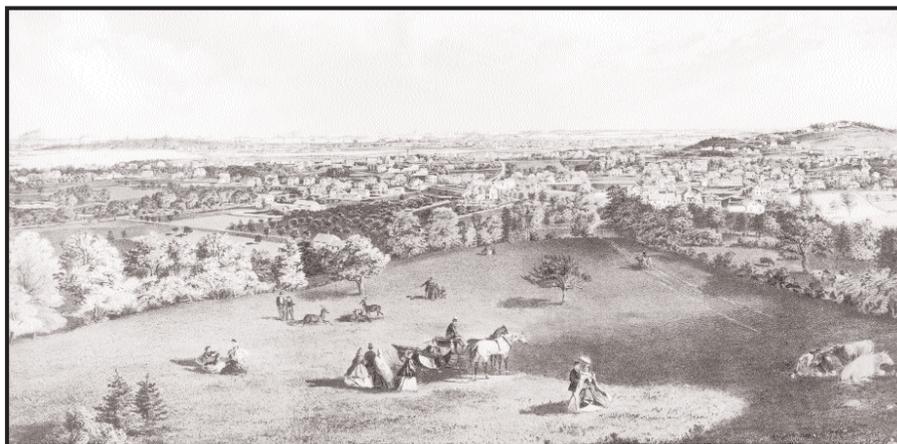
Brookline, initially the "Muddy River Hamlet" section of Boston, was first mentioned in John Winthrop's Journal (1632). It was part of the tract deeded by Chief Chiccatubut of the Massachusetts tribe to the Company of Massachusetts Bay and was settled by inhabitants of Boston, primarily for agricultural endeavors. The area was known for "its good ground, large timber, and store of marsh land and meadow."

Seven major Muddy River land grants from the Town of Boston were made in 1635, and over 100 were made between 1636 and 1642. After obtaining a

limited amount of independence in 1686, the residents of Muddy River were allowed to manage their own affairs and maintain their own school.

In 1705, a petition signed by 32 freeholders to make the hamlet a separate town was approved; five men were chosen selectmen and "Muddy River" was incorporated as the Town of Brookline.

Among prominent residents of this period were Zabdiel Boylston, a physician who introduced inoculation against small pox to the North American colonies; and Samuel Sewall, son of Judge Sewall of



Environs of Boston, From Corey's Hill, Brookline, Mass.
J. H. Bufford, 1865

Salem Witch trial fame. John Goddard, a Brookline farmer, emerged as an important figure during the Revolution. He was appointed Wagon-Master General for the Continental Army and also planned the fortification of Dorchester Heights.

During the 17th and 18th centuries, Brookline agriculture dominated its economy and development patterns, with limited commercial and industrial activity. Industrial activity included tanneries, a sawmill, a forge (converted from an earlier chocolate factory) and a grist mill. Fresh fruits and vegetables from the farms of the Craft, Corey, Davis, Stearns, Griggs, and Coolidge families found its way into the burgeoning Boston markets.

Transportation greatly affected Brookline's patterns of development. The Punch Bowl Tavern and lower village grew up around the 1640's cart bridge on Washington Street. The Boston-Worcester Turnpike (Route 9) was built in 1806, replacing the Sherburne Road (Walnut and Heath Streets) as the town's major highway and road west.

The turnpike bypassed Brookline's first meeting house and school leaving the neighboring Town Green and other southern sections isolated and less prone to development. Extension of the Boston-Worcester Railroad (now the MBTA D line) to Brookline Village in 1847, confirmed the Village's emergence as a principal civic and commercial center of town. Beacon Street was first built as a country road in 1850.

Access to Boston spurred the development of the Linden Area in Brookline Village, Cottage Farm and Longwood. Thomas Aspinwall Davis hired Alexander Wadsworth to convert his family's apple orchards into a planned residential community with squares and development restrictions. David Sears purchased land from the Sewall family and slowly developed his property into the residential suburb of Longwood, with its wooded area of squares, cottages and a church based on an English model. Cottages of his children were built in and around the 14,000 trees he was said to have planted. In the 1850's the textile merchant, Amos Lawrence and his brother William purchased land east of Sears'

and proceeded to lay out streets and build houses for family, friends and business acquaintances, naming it Cottage Farm.

Brookline Village continued to expand after the 1850's. More and more land was developed into residential neighborhoods and the second Town Hall was constructed on Washington Street and the Public

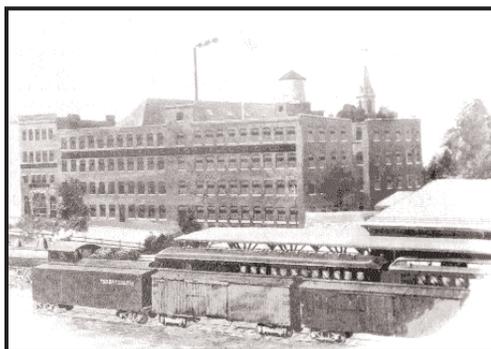
Library was constructed in 1864. Brookline was the first community in the state to establish a public library using tax monies (and was later the first in the country to establish a children's room).

The 1850s also saw the emergence of the Irish and German communities in Brookline. In 1853, the Town's first Catholic Church was constructed serve a parish comprise, to a major extent, of town employees, shopkeepers, farmers and servants of some of the large estates. The Irish community originally centered around Brookline Village, dispersed by the 1860s to new neighborhoods along Boylston Street, near Eliot Street and Chestnut Hill Avenue; and on Hammond Street. German immigrants also lived in the Village and in a community on Heath Street near the Newton border.

During the post-Civil War period small businesses, including carriage factories, lumber yards and manufacturers of woolen goods were joined by larger industries such as E.S. Ritchie Company, manufacturers of scientific instruments and the Holtzer-Cabot Electric Company.

The Town's economic stability was maintained not by these few businesses, but by farming and a growing reputation as an attractive suburb. Boston merchants, among them Augustus Lowell, Eben Jordan, Joseph Huntington White and Barthold Schleisinger continued to build or buy homes in Brookline.

They were joined by figures in all lines of work, from Joseph Fitzgerald Kennedy; Henry Varnum Poor, creator of Standard & Poor; Walter Channing, leading physician in mental health; the Lowell family, Amy Lowell, poet, Percival Lowell, astronomer, and A. Lawrence Lowell, president of Harvard University; King Gillette, inventor of the safety razor; Frederick Law



Holtzer-Cabot Electric Company, Station Street
Source: Brookline Public Library



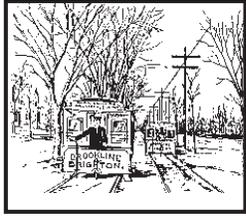
Linden Park in the 1890's, showing Thomas Aspinwall Davis House, built 1844.
Source: Brookline Public Library



Augustus Lowell estate, Heath Street, showing poet Amy Lowell's garden
Source: Harvard University

Olmsted, father of landscape architecture and a host of architects many of whom contributed to the physical character of Brookline in buildings or design:

Henry Hobson Richardson, Charles Rutan, George Tilden, George Shepley, Robert Peabody, Guy Lowell, Walter H. Kilham and Edward C. Cabot-many of whom contributed to the Peabody, Guy Lowell, Walter H. Kilham and Edward C. Cabot-



Beacon Street trolley, 1889
Source: Rollsign, 1989

Widening of Beacon Street and introducing the electric streetcar transformed the once northern agricultural section into a "streetcar suburb". Park Commission and developer Henry Whitney hired resident Frederick Law Olmsted to design this grand boulevard

which remains to this day one of Brookline's premier resources. Along its route parcels of land were developed individually or in blocks adding to the charm and harmony of architecture. Many of the new professional classes made their homes here. At the same time some of the older estates and large farms were subdivided into residential lots in the High Street Hill, Aspinwall Hill, Fisher Hill, Chestnut Hill and Corey Hill neighborhoods.

By 1900, most of the older estates and farmland had been subdivided into residential areas, and the once marshy Muddy River had become an integral part of Olmsted's Emerald Necklace. Suburban residential development continued in the northern sections, as did the building of major estates in South Brookline. The commercial center moved to Coolidge Corner with the construction of the S.S Pierce Building and the development of Beacon and Harvard Streets. Two annexation attempts by Boston (1873 and 1880) had failed. A new park commission had set aside land for parks and playgrounds: Cypress Field and Brookline Avenue Playground, purchased in 1871, are the first municipal parcels in the U.S. bought for recreational purposes; water and sewage systems had been completed; and a public education system of 15 schools had been established.

The early decades of the 20th century were marked by growth of areas near public transportation routes, and construction of multi-family residential units, particu-

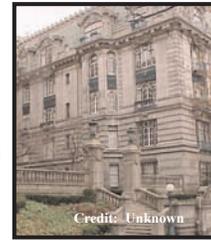


Hancock Village, 1946-49
Source: Brookline Public Library

larly along Beacon Street and to its immediate north and south. Since the 1930s, the town witnessed the subdivision and residential development of 19th century estates, particularly in those areas of town that had not been connected by rail or streetcar, but which with increasing automobile ownership became accessible to other parts of Boston. The last fifty years have also been marked by the transfer of large houses and sites from single families to institutional use.

Although Brookline has changed from its early agricultural beginnings, it retains much of the character established in the 19th century. Although the 20th century has seen many changes in the town, including the post-World War II development of South Brookline, the increasing diversification of the population, the disappearance of most of the estates and the proliferation of apartment building. Brookline containers to be governed by a large town meeting (although it became a representative town meeting-invented by resident Alfred Chandler) and the authority of the five selectmen have not changed since 1705.

Brookline's built environment is the outward manifestation of the social, political and cultural forces that have shaped the Town. Its span of history encompasses participation in the Revolutionary War; the *abolition* movement and the Underground Railroad; *urban planning* from early Victorian to late 19th century Beacon Street



Stoneholm, Beacon St., 2000
Credit: Unknown

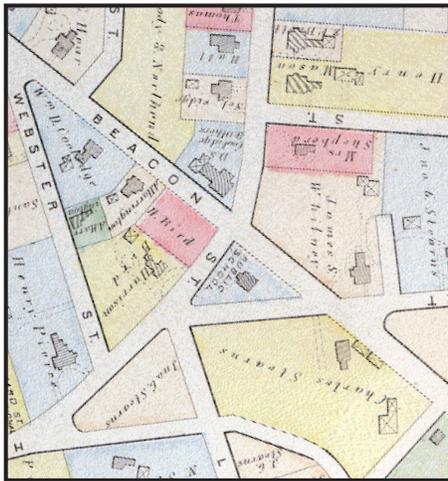
boulevard and Fisher Hill by Frederick Law Olmsted, Sr. to modern planning and zoning with Frederick Law Olmsted, Jr.; *landscape architecture* by Frederick Law Olmsted and successor firms, Ernest Bowditch and Charles Sprague Sargent, the first director of the Arnold Arboretum; *transportation*: electric trolley and early automobile garages; *model housing* from the Lawrence Foundation buildings in the Point and Kilham's 20th century enclave on Highland Road to Hancock Village; to *recreation and health* with early playgrounds and bathhouse.



Hancock Village, 1946-49
Source: Joel Shield

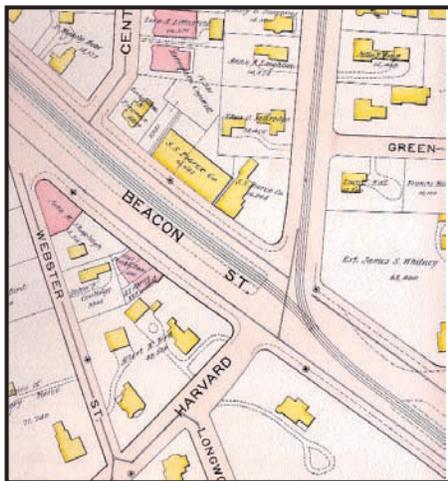
Evolution of Coolidge Corner

Showing changes over time and streetcar lines



1874

Source: G.M. Hopkins Atlas of the of Brookline



1897

Source: Atlas of the Town of Brookline



1927

Source: Atlas of the Town of Brookline

EXISTING HISTORIC & CULTURAL RESOURCES

Brookline's historic fabric is preserved through a variety of mechanisms. The Preservation Commission investigates cultural properties and is responsible for nominating significant ones to the National Register of Historic Places. In addition, it also coordinates with other Town agencies activities involving these properties and administers the Local Historic District By-law and the Demolition By-law.

Brookline has a wide and varied building stock and variety of historic landscapes. The Town's sense of community personality and character arise from the individual properties and their relationships to each other.

The preservation efforts of the Town are coordinated through the members of the Preservation Commission and its staff. Brookline, designated a Certified Local Government, carries out a number of statutory functions as well as being responsible for the identifying, recording and preserving the Town's cultural assets.

National and State Register Properties

National Register listing designates a property as worthy for preservation and recognition that it is of significance to the Nation, the State, or the community. It also provides limited protection from adverse effects by federally funded, licensed or assisted projects.

In 1974, the Brookline Preservation Commission began an intensive survey of all Brookline properties over fifty years old. Since that time, more than 3,000 properties have been surveyed, one of the most extensive collections in the State. Sixteen districts have been placed on the National Register of Historic Places and the State Register of Historic Places. Any property on the National Register of Historic Places and within a Local Historic District are automatically listed on State Register of Historic Places.

Brookline's National Register properties reflect its historic development ranging from 18th century single family houses, to early suburban developments, to late 19th century neighborhoods with curvilinear streets, to worker housing and the grand Beacon Street boulevard. The list also includes many historic landscapes, such as the Emerald Necklace, Larz Anderson Park and Longwood Mall.



Dutch House, 1893, Netherlands Road
Source BPC

Two National Register properties are open to the public as museums sites, including the Devotion House on Harvard Street and the Museum of Transportation at Larz Anderson Park. Two other properties, also National Historic Sites are run by the National Park Service: the John F. Kennedy Birthplace on Beals Street and the Frederick Law Olmsted Site on Warren Street.

The Commission is constantly reviewing properties that are eligible for National Register listing, such as the Coolidge Corner Theatre and Hancock Village.

Local Historic Districts

Two local historic districts have been established: Cottage Farm and Pill Hill. These districts are also on the National and State Registers. Cottage Farm contains part of the planned communities developed by David Sears and Amos Lawrence in the 1850's. The houses of Frederick Sears's house and Amos

NATIONAL REGISTER DISTRICTS

BEACON STREET (1985)
BEACONSFIELD TERRACES (1985)
BROOKLINE VILLAGE COMMERCIAL DISTRICT (1979)
CHESTNUT HILL (1985)
COTTAGE FARM (1985)
CYPRESS STREET/EMERSON GARDEN (1985)
FISHER HILL (1985)
GRAFFAM DEVELOPMENT (1985)

GREEN HILL (1985)
LARZ ANDERSON PARK (1985)
LONGWOOD (1978)
OLMSTED PARK SYSTEM (1971)
PILL HILL/HIGH STREET HILL (1977)
STRATHMORE ROAD (1985)
TOWN GREEN (1980)
WHITE PLACE (1985)

LOCAL HISTORIC DISTRICTS

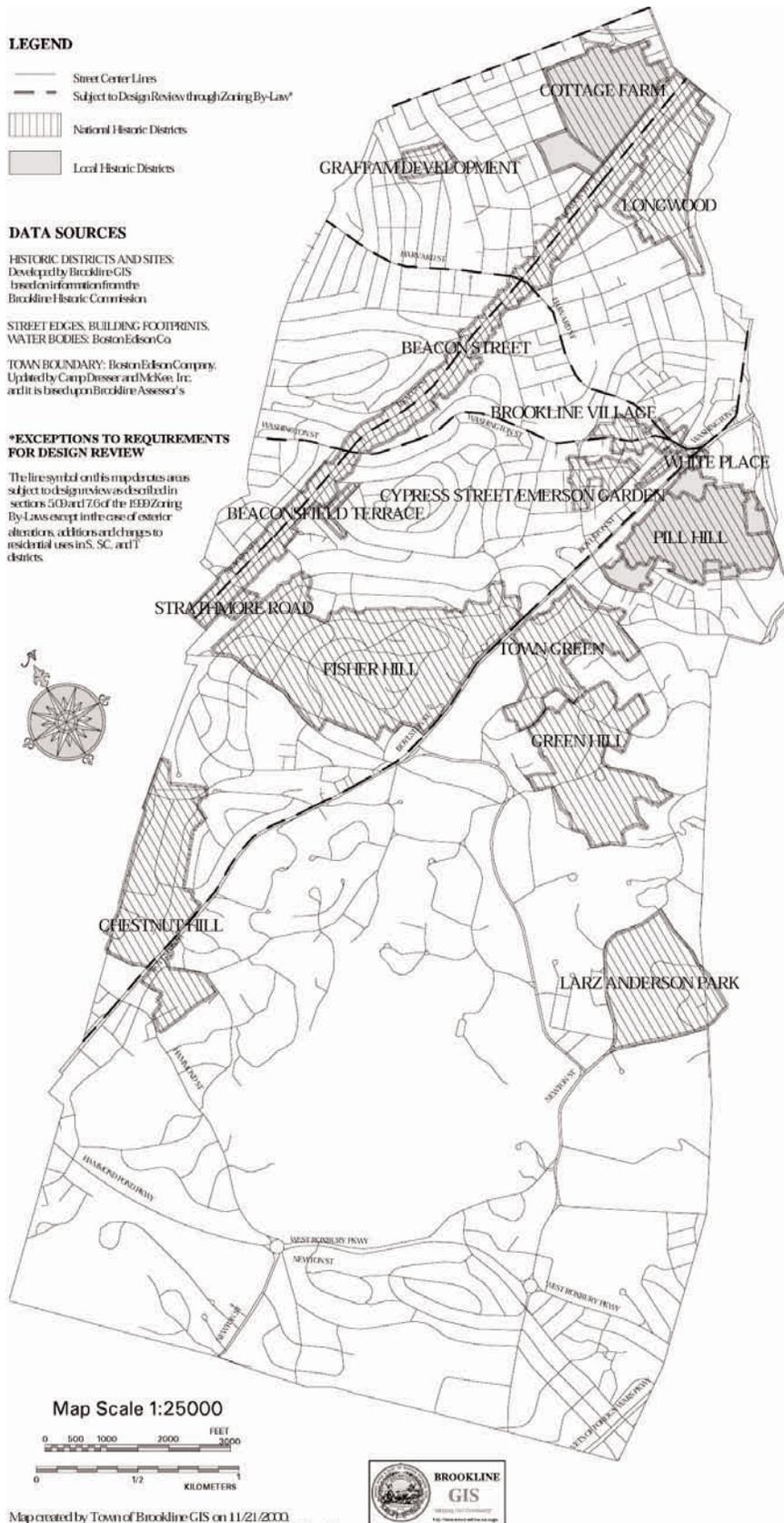
COTTAGE FARM (1979)
PILL HILL (1985)

NATIONAL HISTORIC SITES

FREDERICK LAW OLMSTED HOUSE & OFFICE
JOHN FITZGERALD KENNEDY BIRTHPLACE

HISTORIC DISTRICTS & DESIGN REVIEW AREAS

FIGURE 1



Lawrence's still stand along with others of the period in Cottage Farm. It also contains early 20th century suburban housing as well as an early International Style house from 1936. Amory Park, Amory Woods and Hall's Pond are part of this district.

Pill Hill, immediately south of Boylston Street, encompasses properties from the 1820's to the 1950's. Among its most significant structures are the Tappan-Philbrick House, a stop on the Underground Railroad, the house of architect Robert S. Peabody, early 20th century model housing on Highland Road and the Free Hospital for Women on Cumberland Road.

Scenic Roads and Scenic Views

The 1983 *Preservation Plan* recommended that four Brookline streets be considered for Scenic Road status: Cottage Street; Warren Street between Town Green and Lee Street; Walnut Street, from High to Warren; and Heath Street from Hammond to Boylston Street.

Warren and Cottage Street were constructed in the 18th century to serve the earliest suburban residents. They follow the topography with many turns and original stone walls and graceful trees. The Walnut-Heath route goes back to the period before European settlement and became the Sherburne Road, until 1809 the only route west from Boston. It contains the Town Green area and many historic houses.

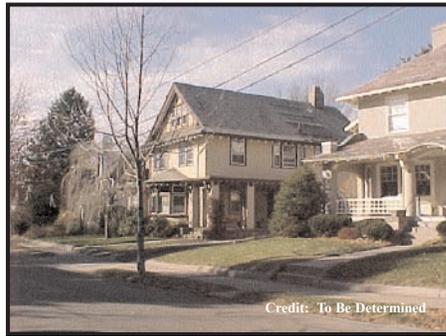
Brookline has two impressive views from the summits of Corey Hill and Larz Anderson Park. These scenic views of Boston and the surrounding area have been recognized for many years as important town amenities. In fact in a report completed in the 1960s, the well-known planner Kevin Lynch identified these scenic views, among others, as important elements contributing to Brookline's character and quality of life.

Regional Connections

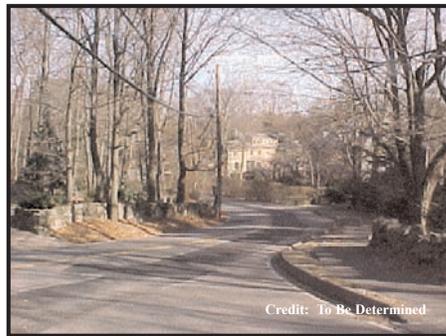
Several Brookline properties are also listed within a regional thematic National Register District. In 1984, the Water Supply System of Metropolitan Boston was placed on the National Register, including properties within Brookline. They are the Brookline Reservoir and its buildings, the Waste Water building off Reservoir Road

in Chestnut Hill and the Fisher Hill Reservoir and gatehouse. The Hammond Park Parkway and the West Roxbury Parkway have been found to be eligible as part of the Metropolitan Park System.

The Olmsted Park System, or Emerald Necklace, which includes Riverway Park and Olmsted Park, comprises sections located in Brookline and Boston. The Chestnut Hill National Register District abuts Newton's Chestnut Hill National Register District and Chestnut Hill Local Historic District.



Salisbury Road, 2000



Warren Street, 2000



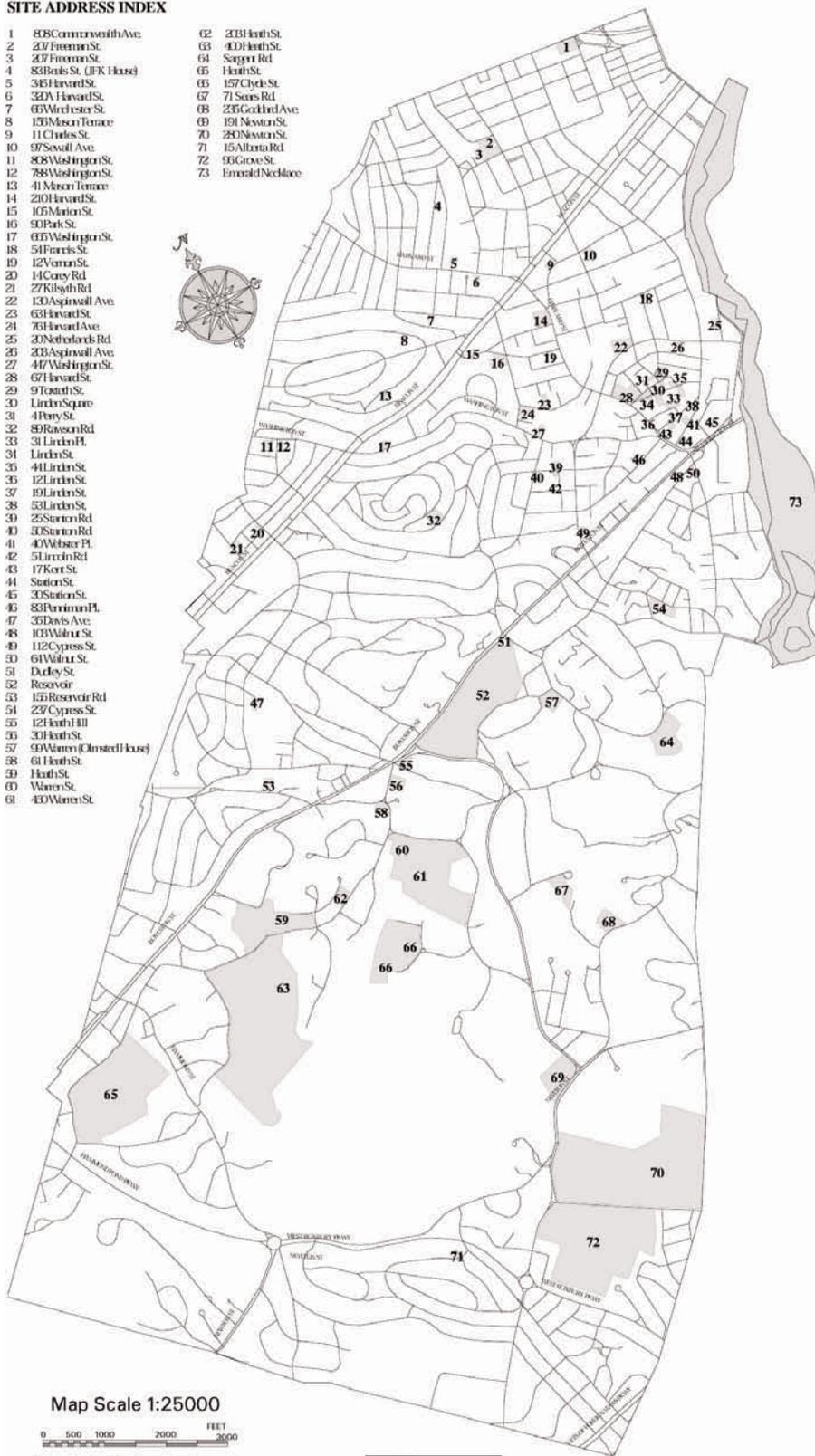
Osborne Road, 2000

INDIVIDUAL HISTORIC SITES

FIGURE 2

SITE ADDRESS INDEX

- | | |
|-----------------------------|---------------------|
| 1 83 Commonwealth Ave. | 62 231 Heath St. |
| 2 27 Freeman St. | 63 431 Heath St. |
| 3 27 Freeman St. | 64 Sargent Rd. |
| 4 83 Beals St. (JFK House) | 65 Heath St. |
| 5 361 Harvard St. | 66 157 Clyde St. |
| 6 32A Harvard St. | 67 71 Sears Rd. |
| 7 65 Winchester St. | 68 235 Goddard Ave. |
| 8 156 Mason Terrace | 69 191 Newton St. |
| 9 11 Charles St. | 70 280 Newton St. |
| 10 57 Swoll Ave. | 71 15 Albano Rd. |
| 11 88 Washington St. | 72 66 Cox St. |
| 12 78 Washington St. | 73 Emerald Necklace |
| 13 41 Mason Terrace | |
| 14 210 Harvard St. | |
| 15 105 Milton St. | |
| 16 50 Park St. | |
| 17 65 Washington St. | |
| 18 51 Francis St. | |
| 19 12 Vernon St. | |
| 20 14 Cony Rd. | |
| 21 27 Kilsyth Rd. | |
| 22 130 Aspinwall Ave. | |
| 23 63 Harvard St. | |
| 24 76 Harvard Ave. | |
| 25 20 Northford Rd. | |
| 26 33 Aspinwall Ave. | |
| 27 47 Washington St. | |
| 28 67 Harvard St. | |
| 29 9 South St. | |
| 30 Linden Square | |
| 31 4 Perry St. | |
| 32 89 Rawson Rd. | |
| 33 31 Linden Pl. | |
| 34 Linden St. | |
| 35 44 Linden St. | |
| 36 12 Linden St. | |
| 37 19 Linden St. | |
| 38 53 Linden St. | |
| 39 25 Stanton Rd. | |
| 40 83 Stanton Rd. | |
| 41 40 Webster Pl. | |
| 42 51 Linden Rd. | |
| 43 17 Kent St. | |
| 44 Station St. | |
| 45 35 Station St. | |
| 46 83 Benjamin Pl. | |
| 47 35 Davis Ave. | |
| 48 103 Walnut St. | |
| 49 112 Cypress St. | |
| 50 61 Walnut St. | |
| 51 Dudley St. | |
| 52 Reservoir | |
| 53 15 Reservoir Rd. | |
| 54 25 Cypress St. | |
| 55 121 Heath Hill | |
| 56 30 Heath St. | |
| 57 99 Winton (Orsted House) | |
| 58 61 Heath St. | |
| 59 Heath St. | |
| 60 Winton St. | |
| 61 Winton St. | |
| 62 Winton St. | |



Map Scale 1:25000
 0 500 1000 2000 FEET
 0 1/2 KILOMETERS
 Map created by Town of Brookline GIS on 11/21/2000
 Map printed on 12/06/00 Map AML: SUAML_plothissites.aml



ISSUES & OPPORTUNITIES

Brookline's built environment is extensive and fairly stable, yet there are a series of issues and opportunities that should be addressed in order to maintain these properties. There are also issues of rehabilitation and preservation of these cultural resources. Buildings and the patterns of development express the community character.

1

Preservation of Town-wide Character

The built environment of any community reflects its unique character and helps form its identity. Not only the individual buildings with their materials, details and styles, but the larger forms and patterns of development are all important ingredients. Brookline has taken great strides in maintaining its cultural and architectural heritage, but new solutions must be pursued if the Town is to preserve its special sense of place. This section looks at overall Town issues, commercial areas, residential areas and individual buildings and places.

Brookline is a wonderful tapestry woven of many unique areas. While each space has its own distinct patterns, all are interdependent and the resulting combination has created a richly textured community. The National Register Districts represent the major trends that have gone into the development of this community. Transportation corridors support mixed-use structures from one story to multiple stories. Residential areas contain modest single family houses to those larger and more varied in style. Many neighborhoods have residences arranged around a plan with squares. Other sections have large mansions nestled in landscaped estates. The history of the Town is written in its built environment and the maintenance of the quality of the physical aspect of Brookline is important to its self-image, economic vitality, stability and citizen enjoyment.

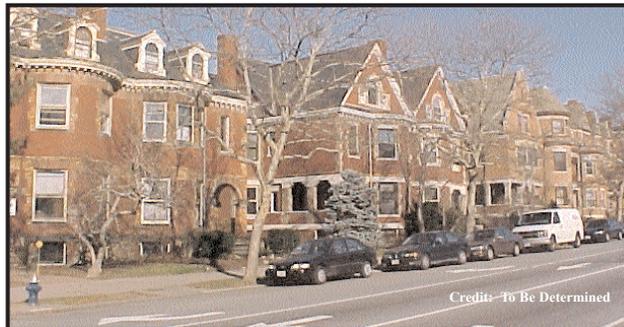
The challenge for Brookline is to conserve and enhance those elements that define the special community character and heritage and to maintain the

physical and social fabric of the community. One of the strengths of Brookline is that each area has its own unique character, but is woven together by its scale and visual coherence.

Other concerns are the preservation of visual corridors and views of landmark buildings, such as St. Mary's Church in Brookline Village or Coolidge Corner's Medieval Revival S.S. Pierce Building. Visual clutter is another issue that should be addressed, such as the increase in size and number of cables strung from telephone poles. Viewsheds should be identified and respected as scenic views, such as Corey Hill and Larz Anderson.

The Town has the opportunity to delineate and define the characteristics of the neighborhoods which should be taken into account in the planning, zoning and other regulations that oversee the Town's development.

As we alter the built environment, we need to understand the existing historic fabric and its place in the present before irreparably changing. While continued recognition and National and State Register listings are important, we have the opportunity to encourage similar strategies and attention to less formally recognized areas and the role they play in the overall community character. Change and innovation are crucial, but it is imperative to recognize the role that historic resources play in the vitality and sense of continuity of the community.



Beacon Street, 2000

Brookline's commercial areas add spice and vitality to its community life. These nodes are part of the Town's civic and public culture, providing meeting spaces, entertainment, intellectual enrichment and commerce. Many of the retail nodes are located within National Register Districts and have distinctive architecture. The challenge is to maintain the historic integrity of the buildings, while allowing for continued retail and commercial use.

A defining feature of these areas is the important urban design principles that are embodied in their character. The street walls created with building edges along the sidewalks provide an intimate connection with pedestrians and define public space. The human scale and connection is provided by the street floor display windows and facades. The mixed-use aspect of the buildings, combining retail, office, eating, and service facilities are all within walking distance and in close proximity to rapid transportation. These are elements that the "new urbanism" movement, advocates of transit-oriented design and pedestrian-scaled communities, are trying to recreate in town's where they never existed or have been lost. The Town has the opportunity to strengthen this urban-human vitality that has been existed in Brookline for over a century.

Heritage tourism could provide an opportunity for Brookline to strengthen its economic vibrancy. The

19th century Brookline Village, with its unusual Late Victorian Panel Brick buildings, and the turn-of-the-century Coolidge Corner with the S.S. Pierce Building, and Art Deco Theatre and vital shopping area and Arcade building and 20th century storefronts along the Olmsted-designed Beacon Street corridor; are among Brookline's attractions. All areas are easily accessible by the historic public transportation routes.

The Town could pursue various outreach and marketing efforts, including the National Register Itinerary program to inform visitors to the Boston area of the charm of Brookline's historic centers. This program is a web-based travel information site that highlights National Register Districts.

Important aspects of our commercial districts are the variety of buildings as well as the mixture of uses and styles reflected in the architecture of our commercial districts. There is the opportunity to preserve commercial facades by encouraging appropriate, but reversible alterations, when needed, that also allow for vibrant and lively forms of expression.

The opportunity to reuse existing buildings should also be made a priority to increase the diversity of functions and attractions that will attract a wider spectrum of users.



Beacon Street, corner of Webster, 1998

The main patterns in the weave of Brookline are the residential neighborhoods, each with its own history and individual character. These neighborhoods reflect the Brookline's development as well as the evolution of architectural styles and patterns in New England. Each area contributes to the identity of Brookline and, taken together, combine to tell the story of the past, providing a strong base for the future.

Like the commercial centers, Brookline's neighborhoods typically reflect pre-automobile neighborhood characteristics of being compact and walkable, with a pedestrian scale and relationship. Many of the houses have front porches which relate to the sidewalk and street. Garages and parking are typically in the rear or to the side of the lots. The houses form cohesive neighborhoods, often with a mixture of densities and stylistic variations. Most contain pocket parks or open space and have tree-lined streets. These neighborhoods are typically walkable to commercial centers; many are also accessible to public transportation.

Within each neighborhood, individual houses are important. Brookline housing reflects high architectural design and construction quality. Much of the integrity of these buildings remain: roofs, windows, doors, trim. Neighborhoods with strong architectural and historical integrity have been placed on the National and State Registers. These neighborhoods and properties are monitored and need special attention in redevelopment.

Another integral ingredient in the makeup of the neighborhoods is the relationships of the houses to each other and to the streetscape, as well as their siting on the property and set-back from the street, massing, and scale. National Register and State Register properties have a modicum of protection from Federal or State inappropriate action whereas Local Historic Districts require review of all external changes in these areas.

There are other areas throughout Brookline which, due to their individual character and amount of cohe-

sion or social or architectural quality, could be designated as preservation areas. Preservation areas would be different than local historic districts in that they do not have strict preservation regulations and are focused on outreach and education to assist owners and residents in maintain or restoring the visual or architectural continuity of the neighborhood. New design or development guidelines could also be considered to articulate important streetscape elements.

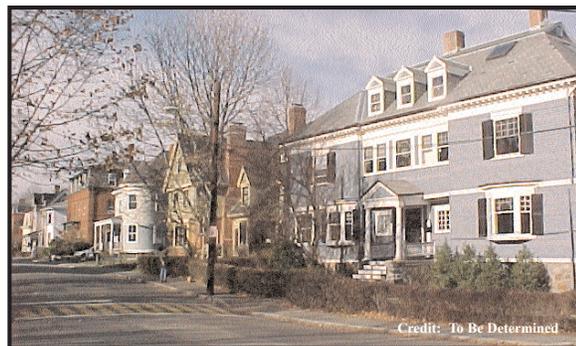
The 1983 *Preservation Plan* made note of several distinctive neighborhoods of vernacular architecture that merited preservation, but were not designated as historic districts at that time. Since that time, a few additional neighborhoods have been determined to be eligible for the National Register and are also potential conservation areas.

In Figure 3, the potential conservation areas are designated in light gray and existing historic-designated buildings are in black. This map shows the connection of these areas to existing identified historic resources.

These neighborhoods could be evaluated for conservation area status as well as others. Some existing National Register Districts might also qualify for this designation, such as White Place and Graffam Development.

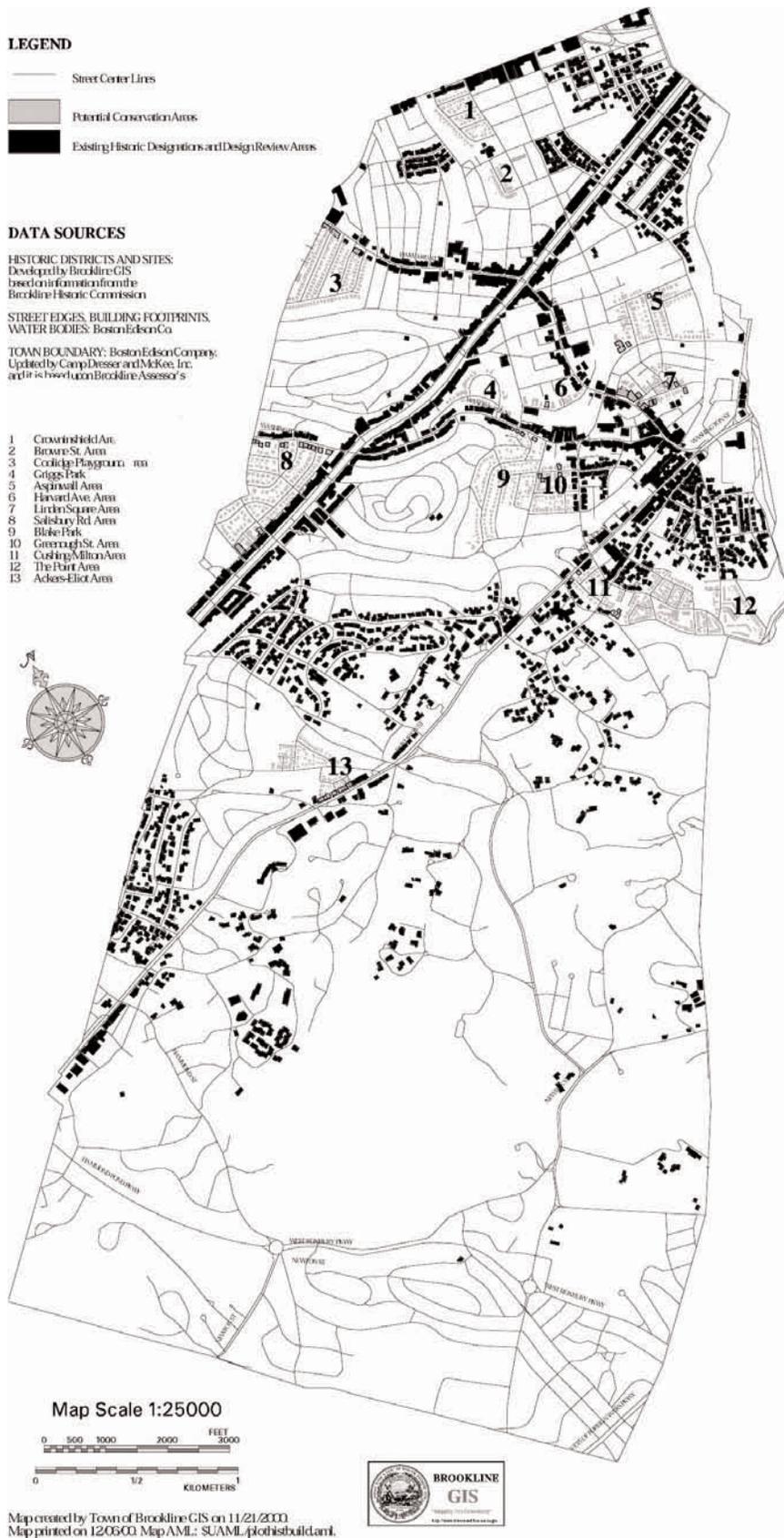
Visual coherence of many neighborhoods in Brookline is compromised by the rapidly proliferating tangles of cables and the continuing trend to wall off residential lots by high solid board fences, both of which serve to compromise or obstruct views.

The Town should review regulations and work with utility companies to take steps to reduce this visual clutter, perhaps by removing obsolete wires, as well as review Town regulations that could control the visibility of these cables. It should also study the possibility of burying these cables and wires as the Town rebuilds the street system. The Town could also explore the creation of guidelines for fence design in certain key areas of Town.



Waverly Street, 2000

POTENTIAL PRESERVATION AREAS FIGURE 3



Individual buildings are the threads that create the patterns of each neighborhood and the loss of even one house can have a major impact on the surrounding area. There is an opportunity to catalog those character-defining features that contribute to the individual property.

There is also the possibility to work with residents using the Commission's collections of historic photographs and pattern books to offer technical advice and support. Town agencies should work to educate the public and other agencies on the importance of these architectural and siting details. We should take this opportunity to discuss the necessity of looking at site planning, massing, style, materials, architectural elements, details and relationship to other structures in any new development plans.

To increase the diversity of housing and to reuse existing building stock, carriage houses can be adaptively re-used. Since these structures are integral to the historic character of Brookline, their preservation should be encouraged. The Commission has been surveying the Town's existing carriage houses and garages, many of which have potential for adaptive reuse.

Another method of improving the housing stock and upgrading neighborhoods is to look into creative tax alternatives.

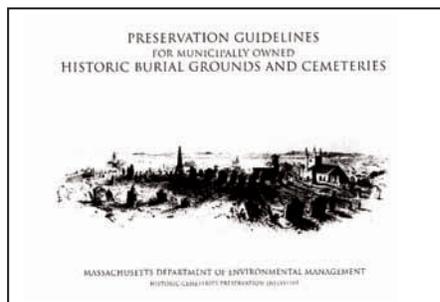
Individual structures also include institutional buildings and sites which are an important ingredient in both the public and private sphere of the Brookline community. These properties include the Brookline Main Public Library; the Ernest Dane estate, now Pine Manor College; St. Paul's Church; Temple Ohabei Shalom and St. Aidan's Church.



Ernest Dane Estate, now Pine Manor
Source: Sam Grey

Much of Brookline's fabric is interwoven with public and private historic landscapes. Several areas have lost their original integrity and need intervention.

Two especial parcels need to be rehabilitated: Emerald Necklace and Larz Anderson Park. The Emerald Necklace has been undergoing rehabilitation for several decades and is about to enter a new phase. The Olmsted Park section, thanks to local, state and federal funds as well as countless hours of concerned residents, is almost completed. The Riverway awaits an upcoming dredging project and subsequent restoration. The Town, through the Park and Recreation Commission, the Conservation



Commission and the Preservation Commission oversee these actions.

Several private parcels have lost their historic integrity through subdivision and development. Review of small and large developments should take into the larger impact on the community character and utilize mechanisms to preserve as much integrity as possible.

Larz Anderson Park, a National Register district, is a unique resource combining designed landscapes, open fields, recreation areas, historic houses (an 18th century schoolhouse and cottage and a museum) along with an incomparable view of Boston. An Urban Self-Help grant began the process of rehabilitation. More work needs to be done to record, maintain and rehabilitate the landscape and structures. Several of the historic buildings have been stabilized, but the majority are in need of intervention.

The Town-owned cemeteries are both listed on the National and State Registers should be preserved. There is the opportunity to act on the preservation guidelines developed for the Old Burying Ground on Walnut Street.

The Town has a number of incentives and regulations in place to protect and maintain its cultural and historic resources. These include Local Historic District designation, the Demolition By-Law, and the Zoning By-law, which calls for design and facade review on certain corridors and triggers design review on major impact projects.

The following is a description of our existing programs and regulations and specific issues and opportunities, where applicable.

National and State Register Designation

National and State Register designation cannot protect a structure from alteration or demolition, there are certain levels of protection and advantages. The Commission is responsible for reviewing the impact of Federal or State actions on National and State Register properties to eliminate, minimize or mitigate adverse effects. Among recent projects have been the Olmsted Park restoration, the Emerald Necklace dredging and the MBTA Light Rail Accessibility project. There is the responsibility to continue National Register designation as buildings and neighborhoods reach the 50 year-old threshold and new information emerges.

National and State Register properties are eligible for Investment Tax Credits which can assist in their restoration. Among the buildings to take advantage of this program are S.S. Pierce Building, Richmond Court, the Arcade Building and the Free Hospital for Women. Finally, National Register properties are also these eligible for grant programs: Italianate garden at Larz Anderson, Allerton Street Overlook and tree survey in the Riverway. These buildings qualify *because* they are on the National and State Registers.

Local Historic Districts

Local Historic Districts are regulated under under M.G.L. Chpt. 40 C as adopted by the Town under

Section 5.6.1 to 5.6.10. The purpose of establishing districts is to preserve the unique characteristics of structures and their surroundings within a certain area; to maintain and improve the setting for those structures; and to encourage the builders of new structures in the area to choose architectural designs that complement the historic structures.

The By-law provides for review of any proposed exterior changes of buildings or new construction within the district. Brookline has established two local historic districts, Cottage Farm (1979) and Pill Hill (1983). A design review process is required before any visible change from a public way to structures in these districts.

Preservation Areas

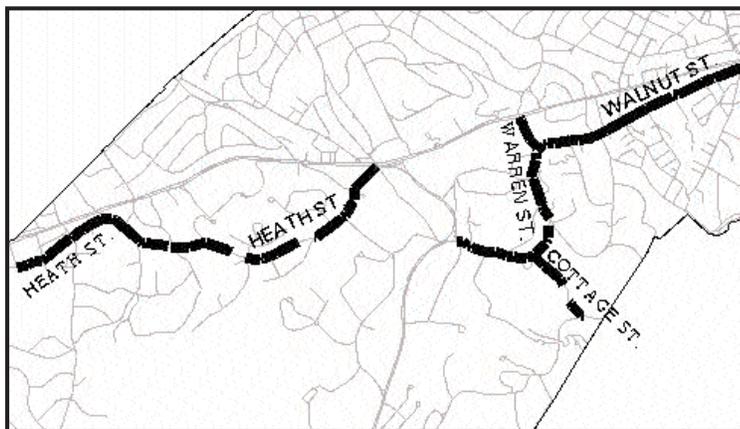
New zoning strategies, such as overlay districts, or tax incentives, coupled with outreach to owners, could be put into place for those areas identified for Neighborhood Conservation status. Each area could have an informal set of guidelines to guide any building activity.

Scenic Roads and Views

In 1973, the Massachusetts State Legislature allowed communities to designate local by-ways as scenic roads. Repair or reconstruction along these roads must be undertaken so that no bordering trees or stone walls are disturbed without the approval of the Planning Board. One way to preserve these views is the acquisition of scenic easements coupled with discouraging development near vantage points from which such views can be enjoyed.

Design Review

The Town has designated certain corridors subject to design review by the Planning Board. Any change to structures in these areas requires a formal review process. Several commercial centers, Chestnut Hill and Coolidge Corner, also have specific guidelines drawn up for the particular areas. These, too, are



Potential Scenic Roads
As identified in the 1983 Preservation Plan

administered by the Planning Board.

Major impact projects throughout the Town also require review under the Zoning By-law. Setbacks, parking and design are considered in reviewing these projects. The Preservation Commission works closely with the Planning Department on properties with National and State Register designation.

Zoning By-Law

The pressures of real estate development in Brookline have led to an increase in the demolition of historic properties. Houses that were designed for relatively large lots are being demolished and the property subdivided for a more high density development. Even smaller properties in areas such as North Brookline are being demolished and replaced by new construction that alters the historic character of neighborhoods that were developed for single and two-family homes.

There is the opportunity to revisit the mechanisms of the zoning by-law to increase incentives for preservation rather than demolition, since the limited stay of demolition does not provide lasting protection.

Adaptive Reuse and Tax Credits

Adaptive reuse and tax credits are tools that can be used to encourage the preservation of community heritage while allowing buildings to adapt to modern times, uses and needs. In commercial areas, buildings can be converted to mixed use to increase residential and office space to attract different types of users. Outbuildings, such as carriage houses can be reused for increased housing or home offices.

There are several examples of successful adaptive reuse project in Brookline : St. Marks' Church into condominiums; Free Hospital for Women into rental units; old Chemical Firehouse into the Brookline Arts Center; the Kennard House into the Brookline Music School; and the more recent development of the old Town Garage and Sewall School into a housing complex.

Easements

Another tool to encourage preservation is the use of easements. This is a mechanism by which the owner agrees to be subject to review of changes to the property in return for certain benefits, such as tax benefits.

The Town has the opportunity to identify special scenic views, landscapes or sites and encourage a program of easements and incentives to encourage development that maintains the character-defining features of historic resources.

Demolition By-law

The Town's Demolition by-law was passed at Town Meeting in 1988 and allows for a stay of demolition up to one year. Any building slated to be demolished must first go through the review process for designation. Demolition of significant buildings can be delayed up to a year while alternatives to demolition are explored.

Since its inception, over 275 applications have been processed, many for non-significant garages and outbuildings. Several significant structures have been saved, including the Coolidge Corner Theatre the house at 109 Sewall Avenue, a 1950 Lustron house in South Brookline. Others have been lost, including the main house and carriage house at 257 Warren Street, the Federal carriage

barn and other outbuildings of Isabella Stewart Gardner estate at Green Hill, the French House at Pine Manor College site. (See Figure 4)

Stewardship and Public Education

The Town owns many historic properties, including the worker cottage at Warren Field, the houses at Larz Anderson Park, several Fire Stations, the Putterham School and the Devotion House (overseen by the Historical Society), and many historic landscapes.

Many of these properties have been renovated over the past few year, but several are languishing for lack of funds or purpose. Two such buildings are the gatekeeper house at 29 Avon Street in Larz Anderson Park and the old Rivers School building at Warren Field. Both have stood empty for several years and are rapidly disintegrating. There is the opportunity to develop a more comprehensive policy of rehabilitation, and rental to maintain the integrity of these properties.

Another means to encourage a climate of preservation and private stewardship are public education programs and outreach. Several Historic Neighborhood Brochures have been published and walking tours conducted. More visibility needs to be initiated through both public and private agencies.

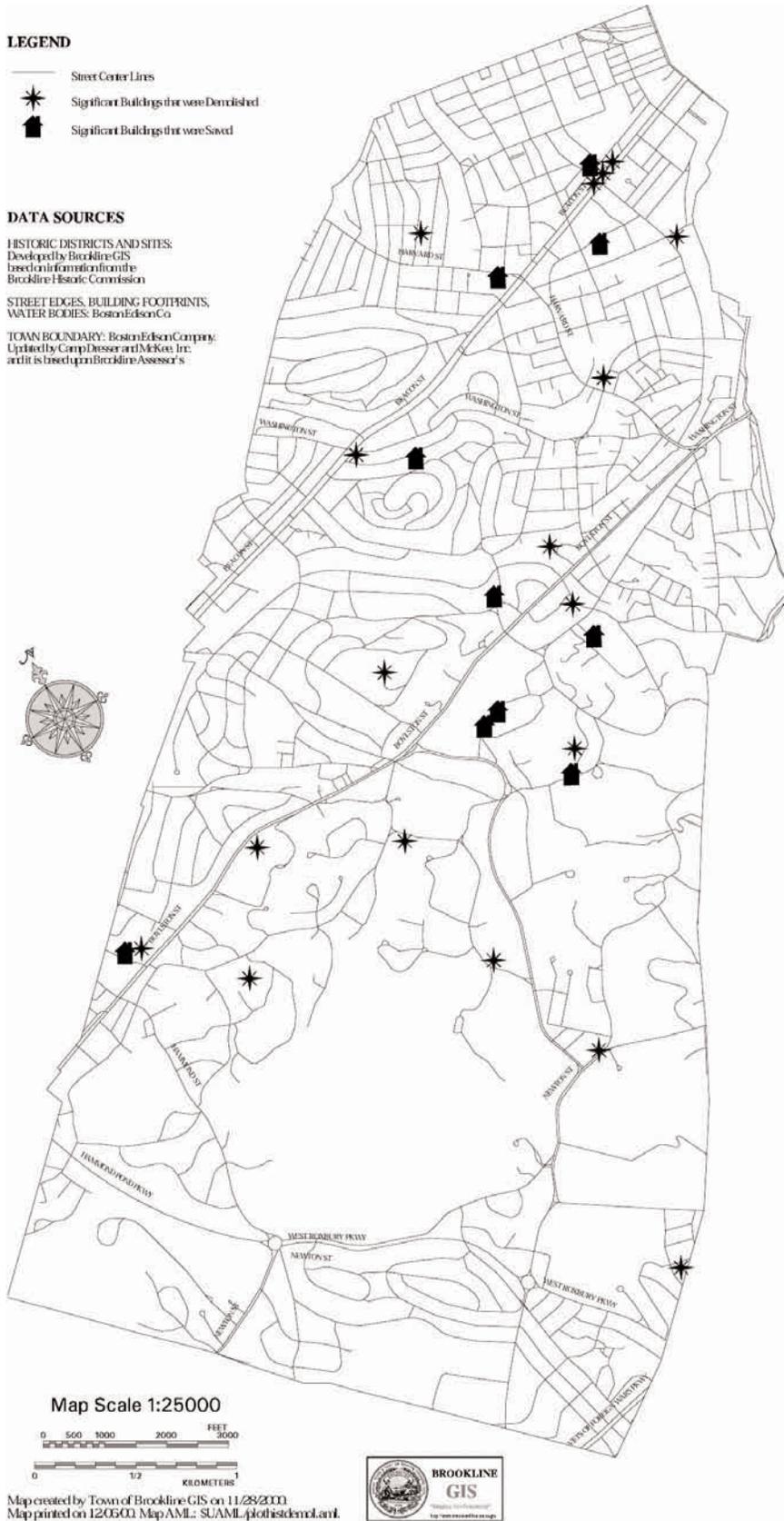
Coordination with the public schools should also be encouraged to ensure a healthy awareness of the existing built environment and form a basis for good design decisions in the future.



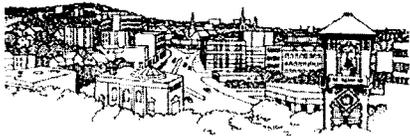
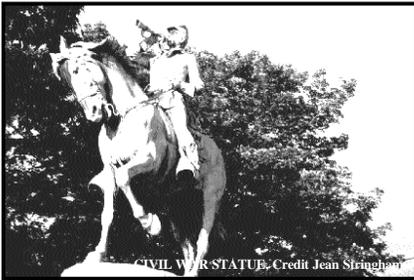
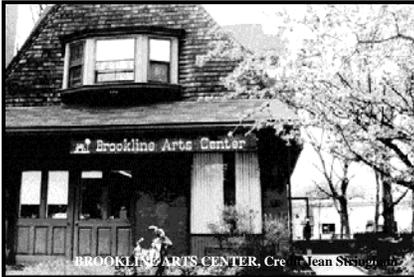
514 Warren, built 1895
demolished 1995

PROPERTIES REVIEWED UNDER DEMOLITION BY-LAW

FIGURE 4



ARTS & CULTURE



BROOKLINE COMPREHENSIVE PLAN 2005-2015

issues & opportunities report

INTRODUCTION

Integrating art and culture into our lives can dramatically strengthen our sense of place, improve the quality of our lives, and afford us a higher understanding of our community and individual lives.

Brookline has a strong and active arts and cultural community, which is strengthened from our proximity to the many cultural organizations, activities, and resources in the region, but which is unique and individual to Brookline. Resident artists, including painters, photographers, sculptors, graphic artists, playwrights, poets, musicians, dancers, and performers, and cultural organizations, such as the Brookline Arts Center, Coolidge Corner Theater, The Puppet Showplace Theater, and the Brookline Music School, have lead the way to establish the Brookline Commission for the Arts (formerly known as the Council for Arts and Humanities).

BROOKLINE COMMISSION FOR THE ARTS

The Commission, appointed by the Board of Selectmen, exists to preserve, enrich, and develop the unique artists and humanists, their supporting organizations, and the general community, by building bridges between them. In addition to supporting pub-

lic art, providing networking opportunities for the arts and humanities community, the Commission allocates grants from state lottery funds. There are two types of grants: the Brookline Community Awards are for projects that enhance the educational and/or cultural experiences of Brookline residents and Dissemination Grants provides funding for artists with a completed body of work to defray the expense of publishing, exhibiting, or performing their work. In addition, the Commission also runs the PASS program, which allows schools to purchase tickets to cultural programs outside of the school. The Commission grants just under \$20,000 for most years (although this year, over \$14,000 additional dollars were received).

The current Commission membership represents a wide spectrum of interests and experience in the arts, including visual arts, music, photography, communications, publishing, and graphic design.



Credit: Jean Stringham

PUPPET SHOWPLACE THEATER



COOLIDGE CORNER MOVIEHOUSE



Credit: Jean Stringham

BROOKLINE ARTS CENTER



Credit: Jean Stringham

MURAL AT JFK CROSSING

ISSUES & OPPORTUNITIES

In order to identify issues and opportunities for arts and culture, the Brookline Commission for the Arts conducted a survey of 30 key Brookline arts organizations and artists. The survey enabled respondents to rank 9 issues identified by the Brookline Commission for the Arts. The issues and opportuni-

ties identified through this survey, in addition to other key issues and opportunities, are reflected in the 7 categories below: Master Planning & Focus Areas; Art & Streetscapes; Celebrations & Events; Space Needs; Artist's Living & Working Spaces; New Media; and Resources.

Master Planning & Focus Areas

1

In its most basic way, public art represents a communication between an artist and audience. But, public art can be much more than this by contributing to the health of the community, creating a more vibrant sense of place, further defining Brookline's identity, and, if created through an effective community planning process, can be a vehicle for citizens to directly shape their visual environment. Traditionally, public art has either been the afterthought of a larger project or has been the result of an intention for a specific site. In order for art to truly impact our community and individual lives, we need to think in a comprehensive way to effectively integrate and coherently choreograph public spaces through art.

To begin to think comprehensively, a planning process will need to be established that identifies the unique aspects of Brookline that contribute to our

sense place and could be enhanced through public art. It may be the the community as a whole has unifying aspects that can inform the creation of public art and be used throughout Town and, particularly to strengthen gateways into Town. A unifying theme could be used to create gateways at various key entrances to Brookline, such as either end of Boylston Street, Beacon Street, and the northern end of Harvard Street.

In addition to town-wide themes, individual neighborhoods and commercial areas have their own unique identities that are linked with but individual from the Town as a whole that can be enhanced and strengthened through public art. Clarifying the unique neighborhood identities can translate into identifying planning focus areas.

Art & Streetscapes

2

Uniting the arts with our neighborhoods and commercial areas offers a vast array of options to improve the quality of our built environment. In addition to art works like sculptures, monuments, fountains, and murals, art can also work to enhance functional streetscape objects like benches, trash cans, pedestrian lights, public signs, sidewalk paving materials, crosswalks, and landscaping. Art can add meaning

and color to the built environment, creating and defining the perception and image of neighborhoods and commercial areas. Linked with the master planning concept described above and the identification of focus areas, unique and individual themes can be defined and translated into comprehensive streetscape improvements for neighborhoods and commercial areas.

Celebrations & Events

3

Public art and cultural activities can create an atmosphere of celebration for special events, such as Brookline's upcoming tricentennial anniversary in 200x. It will be critical for the Brookline

Commission of the Arts to work closely with the Town in planning and preparing for this major celebration of Brookline's history, longevity, and future aspirations.

Space Needs

4

In order to enhance and support the growth of arts and artists in Brookline, it is important to provide public space in which to view art works of private individuals, cultural events, such as concerts and performances, as well as poetry and literary readings. An interdisciplinary exhibition space could be created

for all of these types of events. This type of space could be focused not only on Brookline artists, but particularly geared toward assisting and publicizing new artists including first-time novelists, poets, visual artists, and performing artists.

5

Artist's Living & Working Spaces

In order to support and strengthen the Brookline arts community, it is important that artists have the opportunity to afford to live and work in Brookline. This issue is closely linked with the issues of affordable housing, explained more thoroughly in the *Issues &*

Opportunities Report on Housing. Providing expanded affordable housing opportunities would not only support existing and new artists but can increase the diversity of artists in terms of socio-economic, race, and cultural diversity.

6

New Media

Art as creative expression is continually enhanced and expanded through the use of new media. At one point in time, photography was considered a new artistic media. More recently, computer and video technology have provided creative opportunities to

expand the look and meaning of art. It will continue to be important to provide opportunities for artists to work with new media. This can become an important element to expand our understanding of what art is for the private artists, school-age artist, and public art.

7

Resources

To continue and expand support for the arts in Brookline, it is critical that additional resources in terms of funding, administration, and committed volunteers be sought and tapped. The Brookline Commission of the Arts relies heavily on funds from the State Lottery. In addition, the Town has matched a grant to fund a part-time staff person to administratively support the Commission. It will be important to supplement these funding resources for purposes of art creation, administration, maintenance, and educa-

tion with other government grants, private donations, and grants through non-profit organizations and institutions.

In addition, in order to further the efforts of the Commission, it is vital to continue to reach out to Brookline artists and arts-supportive citizens to expand the volunteer work force working for these common goals.