2003 Annual Town Gown Report



Massachusetts Institute of Technology

November 3, 2003

Table of Contents

I. EXISTING CONDITIONS	1
A. FACULTY & STAFF	1
B. STUDENT BODY	1
C. STUDENT RESIDENCES	2
D. FACILITIES & LAND OWNED	2
E. REAL ESTATE LEASED	
F. PARKING FACILITIES	
G. PAYMENTS TO CITY OF CAMBRIDGE FY 02 & FY 03:	5
II. TRANSPORTATION DEMAND MANAGEMENT	6
A. RESULTS OF COMMUTING SURVEYS	6
B. COMMUTER POINT OF ORIGIN	6
C. TRANSPORTATION DEMAND MANAGEMENT PROGRAMS	6
III. RECENT EFFORTS TO SHARE INFORMATION	9
A. PLANNING AND DEVELOPMENT COMMUNICATION	9
B. FURTHER MIT CIVIC PARTICIPATION	
C. MIT ENVIRONMENTAL INITIATIVES	11
D. MIT SUPPORT FOR COMMUNITY-BASED ORGANIZATIONS	13
E. MIT COLLABORATION WITH CAMBRIDGE PUBLIC SCHOOLS (CPS)	17
IV. FUTURE PLANS	21
A. INTRODUCTION	21
B. MIT FINANCES AND CAMPUS PLANNING AND DEVELOPMENT	22
C. GROWTH OF THE STUDENT BODY AND HOUSING	23
D. CAMPUS PLANNING CHALLENGES AND OPPORTUNITIES	23
V. PROJECTS	27
A. RESIDENTIAL AND STUDENT LIFE PROJECTS	27
B. ENHANCED ACADEMIC FACILITIES	28
C. PUBLIC IMPROVEMENT PROJECTS	29
D. UTILITY INFRASTRUCTURE AND PARKING	30
VI. MAPPING REQUIREMENTS	32
VII. INSTITUTION SPECIFIC QUESTIONS	33
VIII. MAPS AND APPENDICES	34

2003 Annual Town Gown Report Update

Institution Name: <u>Massachusetts Institute of Technology</u>

Report for Time Period: <u>7/1/2002-6/30/2003</u>

Date Submitted: November 3, 2003

I. EXISTING CONDITIONS

Please provide the following information about the current conditions and population at your Cambridge campus. Please note where information is unavailable or the question is inapplicable. Add clarifying comments as needed.

A. FACULTY & STAFF Head Count: 7881 FTEs¹ (if available): 6971 Cambridge-based Staff FTEs¹ (if available): 958 Head Count: 965 Cambridge-based Faculty Head Count: 625 FTEs (if available): Contract Employees Number of Cambridge Residents Employed at Cambridge Facilities: 1338 B. STUDENT BODY Total Students Attending Classes in Cambridge (inclusive of all categories below): 10,222* Please provide the following statistics about your Cambridge-based student body: Total Undergraduate Students: 4173 Day: 4173 Evening: N/A Full Time: 4107 Part Time: 66 Total Graduate Students: 5864 Day: 5864 Evening: N/A Full Time: 5687 Part Time: 177 Non-Degree Students: 185 Day: 185

Evening: N/A

^{*}Does not include 95 non-resident PhD students.

¹ "FTE" refers to Full Time Equivalent employees, which treats part-time workers as a fraction of a full time position based on the number of hours worked per week.

C. STUDENT RESIDENCES

Undergraduate Students:
Number residing in Cambridge in Institute-approved housing (includes dormitories, fraternities, sororities, and independent living groups): 3324
Number of these with cars garaged in Cambridge: See Section F: Parking Facilities
Number residing in Cambridge in off campus housing owned and managed by MIT: 5
Number residing in Cambridge in off campus non-MIT housing: 37
Graduate Students:
Number residing in Cambridge in Institute-approved housing (includes dormitories, fraternities, sororities, and independent living groups): 2048
Number of these with cars garaged in Cambridge: See Section F: Parking Facilities
Number residing in Cambridge in off campus housing owned and managed by MIT ³ : 265
Number residing in Cambridge in off campus non-MIT housing: 1712
D. FACILITIES & LAND OWNED
Tax Exempt Facilities & Land:
Acres: _157
Number of Buildings: 125
Size of Buildings (square feet): 9,914,272
Dormitories:
Number of Buildings: 26 Number of Beds: 5,274
Do you maintain a detailed inventory of tax exempt facilities? If yes, indicate contact person and phone:
Greg Knight, Manager of Drawing Information Systems, Dept. of Facilities, 617-253-7094
Taxable Facilities & Land:
Acres: <u>86</u>
All Taxable Properties (gross floor area): N/A*
Commercial Properties Only (rentable floor area): 4,632,163
*MIT's commercial properties are measured by rentable square feet and residential properties are measured by bedroom units.
Do you maintain a detailed inventory of taxable facilities? If yes, indicate contact person and phone:
Michael Owu, Senior Real Estate Officer, 617-258-5634

Page 2 November 3, 2003

Housing (Do not include any information about dormitories in this table.)

	Tax Exempt:	Tax Exempt:	Taxable:	Taxable:
	MIT-Owned and	Other Housing	MIT-Owned and	Other Housing
	Managed		Managed	(Univ. Park &
	Housing		Housing	100 Mem. Dr.
				Ground Leases)
Number				<u>676</u>
of Units:				<u>070</u>
Number of				5
Buildings:				<u>2</u>

^{*5} units are occupied by non-MIT residents.

Property Transfers:

Please list Cambridge properties purchased since filing your previous Town Gown Report:

750 Main Street and 35 Cherry Street (single transaction)

Please list Cambridge properties <u>sold</u> since filing your previous Town Gown Report:

MIT gave the park at 82 Pacific Street to the City in exchange for that parcel's development rights, which were utilized for the construction of the 70 Pacific Street Graduate Residence. The deed was transferred to the City in the spring of 2003.

E. REAL ESTATE LEASED

Please attach to the report a table listing of all real estate leased by your educational institution within the City of Cambridge. Include street addresses, use (e. g., institutional, residences, commercial, etc.) and approximate area of property leased (e. g., 20,000 SF, two floors, entire building, etc.). If your institution does not lease any real estate within the City of Cambridge, you may omit this section.

Academic l	<u>Departments in </u>	Office and	Research S	Space as of	August 2003

<u>Use</u>	Leased Location*	Square Feet**
		11,555
		60,960
		36,197***
		23,899
		45,000
		61,638
		18,403

^{*}Leased on behalf of MIT by the MIT Real Estate Office.

Page 3 November 3, 2003

^{**}The square footage will, in some cases, only be a portion of the entire building.

^{***}Corrected figure from 2002 report.

F. PARKING FACILITIES

This section refers to parking spaces maintained in Cambridge only.

Number of parking spaces maintained for students

(including resident and commuter parking): 1103

Number of parking spaces maintained for faculty, staff and visitors: 3711

Do you charge for the use of parking spaces? If so, please describe your fee schedule: Yes

(effective 9/1/03)

\$518/year/permit with the following exceptions:

\$480/year/permit for residential students

\$259/year/pool for carpools and vanpools

\$333/year/permit for commuting students

\$30/year/permit plus \$3.50/day for occasional parking

\$92/year/permit for retired faculty/professor emeriti without compensation

\$55/year/permit for volunteers

\$616/year/permit/non-employees

Page 4 November 3, 2003

G. PAYMENTS TO CITY OF CAMBRIDGE FY 02

&

H. PAYMENTS TO CITY OF CAMBRIDGE FY 03:		
		<u>\$18,930,865</u>
		<u>\$7,648,778</u>
	\$23,938,166	<u>\$27,772,643</u>
	\$41,387,889	\$34,980,041

Page 5 November 3, 2003

II. TRANSPORTATION DEMAND MANAGEMENT

Please provide the following information. You may summarize the information below or attach documents to this report, as appropriate. If your school has not updated information since submitting the 2002 Annual Report, you may so indicate in the appropriate space below.

A. Results of surveys of commuting mode choice for faculty and/or staff and/or students. (We would appreciate receiving a copy of your survey instrument, if possible.)

Please see appendices 1 and 2.

B. Information on the point of origin of commuter trips to Cambridge for faculty and/or staff and/or students. (This information will assist the City in lobbying for improved regional transit options.)

Percentage
5%
45% 10% 2%
10%
2%
27% 1%
1%
10%

C. Description of Transportation Demand Management programs offered to faculty and/or staff and/or students (e. g., MBTA pass sale programs, shuttle services, bike parking facilities, etc.)

Minimal Parking

From the time the Cambridge Zoning Ordinance first included a parking requirement, MIT has provided the minimum number of spaces required in the ordinance. In fact, since 1990, MIT has not added a single commuter parking space to its inventory.

Parking Fees

For many years, MIT did not charge for parking. Beginning in 1996, the Institute implemented a parking fee to discourage automobile commuting. This fee will gradually be increased annually for the next several years.

Transportation Management Association

MIT has been an active member of the Charles River Transportation Management Association (CRTMA) since its founding in 1994. The Institute currently serves on its Board of Directors, and provides free electronic mail and Internet services to the staff.

Transportation Information Dissemination

MIT regularly disseminates information on alternative transportation modes to employees through electronic mailings, a quarterly newsletter and articles in the campus newspapers. In addition, MIT hosts the annual CRTMA Transportation Fair to expose commuters to a full range of alternatives available to them.

Page 6 November 3, 2003

Carpools and Vanpools

Through preferential parking and reduced fees, MIT encourages commuters to form carpools and vanpools to reduce single-occupant vehicle trips.

Rideshare Program

Through the CRTMA, MIT offers commuters access to Caravan's RideSource computerized ride matching service.

Emergency Ride Home Program

Through the CRTMA, MIT provides an emergency ride home in case of a personal emergency to employees who carpool, vanpool, use transit, walk, or bike to work.

Commuter Incentive Program

Through the CRTMA, MIT provides the commuter incentive program to employees who switch to alternative methods of commuting. This program is funded by MassHighway and administered by Caravan for Commuters. It provides Commuter Checks for 6 months to employees who switch from driving as their primary method of transportation to work.

T-Pass Sales and Subsidies

MIT currently offers a T-pass subsidy to commuting students, faculty, and staff. This represents a subsidy of 62.5% on local bus service, 50% of subway, combo, combo plus, Zone 1 and Zone 2 passes. Subsidy for Zones 3-9 and the Watershuttle is 50% of the retail value of a Zone 2 pass. T-passes are sold at three locations on campus; and bus, subway, and commuter rail schedules are provided to employees and students. MIT subsidizes over 55,000 MBTA passes each year.

Shuttle Services

MIT operates a SafeRide shuttle service, providing free daily service in the evenings and late night to members of the MIT community in the Cambridge, Boston, and Brookline communities. In addition, MIT operates the Tech Shuttle, which provides regular free weekday shuttle service from 7am to 7pm, with stops at the Kendall T and points across campus. The Institute also operates a regular shuttle to Lincoln Laboratories in Lexington, and special shuttle services to Logan Airport before and after major holidays. Together with Wellesley College, MIT also supports shuttle services between the two campuses for cross-registered students. MIT is also a major participant in the EZ Ride shuttle with the CRTMA, with service from Kendall Square to North Station.

Parking and Transportation Office

MIT has a parking and transportation office charged with implementing and overseeing the Institute's parking and transportation program. Staff members in this office are available to assist employees and students in exploring commuting alternatives.

Transportation and Parking Committee

MIT has a transportation and parking committee appointed by the President of the Institute. The committee is charged with recommending parking and transportation policies to the administration.

Bicycle Amenities

MIT has over one thousand bike parking spaces on campus, including several secure indoor bike rooms.

Page 7 November 3, 2003

Shower facilities

MIT provides shower facilities in our recreational facilities for cyclists who need to shower upon arrival to campus.

Telecommuting

As part of MIT's general flexible work schedule policy, the Institute encourages telecommuting for those employees whose jobs lend themselves to this mode of work. To further encourage telecommuting, MIT's Information Systems Department developed Tether. Tether is MIT's remote-access dialup service providing high-speed Point-to-Point Protocol (PPP) connectivity to the campus network and the Internet.

Flexible Work Hours

It is the general policy of MIT to allow flexible work schedules for individual employees where it is to the mutual advantage of both the employee and the department or laboratory. This policy reduces rush hour traffic in Cambridge and neighboring areas.

Zipcars

MIT currently hosts four Zipcars on campus with over 900 MIT subscribers. This program provides hourly car rental service providing another means to reduce vehicle commuting to campus. MIT provides a sponsored account to undergrads over the age of 21, graduate students and employees. This sponsorship helps to lower the financial commitment required of the individual.

On-Site Services

MIT provides several services on campus to help minimize the need for vehicle trips during the workday. These services include cafes, restaurants, a grocery store, a bank, two ATM facilities, dry-cleaners, barber shops, a post office, a travel agency, an optometrist, and a bookstore. In addition, MIT leases space to several restaurants on Massachusetts Avenue and Main Street within walking distance of the campus to further discourage midday vehicle trips.

Page 8 November 3, 2003

III. RECENT EFFORTS TO SHARE INFORMATION

Please briefly summarize efforts made by your institution to share information with either City agencies or the community about your institutional planning process over the past calendar year. You may either use the space below for your response or attach a statement to this report.

MIT participates in a number of initiatives that promote a strong relationship between the Institute and the Cambridge community. Many of these activities entail sharing information regarding MIT's institutional planning processes, while others address the broader needs of the community. The following five sections summarize some of these efforts.

- A. Planning and Development Communication
- B. Further MIT Civic Participation
- C. MIT Environmental Initiatives
- D. MIT Support for Community-Based Organizations
- E. MIT Collaboration with Cambridge Public Schools

A. Planning and Development Communication

The Institute relies upon many communication methods to provide planning and development information to both Cambridge City government and Cambridge residents.

The Evolving Campus Web Site

This site describes every academic capital construction initiative taking place on the MIT campus. It tracks the progress of each project on a weekly basis through imagery, maps, and commentary. Our goal is to keep the impacts of the construction to a minimum, to be informative, and to be responsive to community needs and concerns. MIT is pleased to be able to provide such extensive information to the public in this easily accessible form. We encourage use of the communication mechanisms built into the site.

Log on: http://web.mit.edu/evolving

Call: 617-452-2415

Write: construction@mit.edu
Read: Tech Talk and The Tech
View: Campus Billboards

General information about MIT, including its history and organization, current events, research summaries, Reports to the President, and the MIT Facts Book can be found on the MIT web site at http://web.mit.edu/.

Town-Gown Report

The Institute's current and planned projects are summarized in this year's seventh annual Town-Gown Report. These public reports are an initiative that resulted from the 1991 Committee on University-Community Relations.

Town-Gown Report Presentations

MIT presents a summary of the Town-Gown Report at an annual publicly-advertised Planning Board hearing and, when requested, at a meeting of the City Council.

Page 9 November 3, 2003

Construction Communication Meetings

MIT participates in meetings with staff from the Public Works Department, Traffic, Parking, and Transportation Department, Community Development Department, Water Department, and the City Electrician to discuss construction coordination and mitigation.

Informal Communications with City Departments

MIT staff engage in extensive ad hoc discussions with City staff on Institutional and City projects. Topics such as traffic impact, design, parking, zoning, permitting, sanitary sewer lines, storm water management, and community input are fully reviewed with the Community Development Department, the Traffic, Parking and Transportation Department, the Public Works Department, the Inspectional Services Department, and the License Commission.

Groundbreaking and Opening Celebrations

MIT invites City officials and residents to join in celebratory occasions related to ongoing building projects. At these events, models and drawings, or the new buildings themselves, can be viewed in an informative setting. This year, City officials attended the groundbreakings for Simmons Hall, the 70 Pacific Graduate Student Residence, the Zesiger Sports and Fitness Center, the Picower Center, the McGovern Institute, and the Institute for Soldier Nanotechnology.

B. Further MIT Civic Participation

City Council Committee on University Relations

MIT has participated fully with the proceedings of the University Relations Committee by providing briefings on five community priorities: housing, environment, fiscal health, the public schools, and planning and development.

Communications with City Administration

MIT staff meet periodically with the City Manager and his staff to review projects, issues, and matters of mutual concern.

Neighborhood and Long Term Planning Committee

Along with several corporate and nonprofit organizations, MIT co-sponsored a public discussion on the revolutionary effects of our knowledge-based economy and culture on the City of Cambridge. This discussion, led by Professor Juan Enriques of the Harvard Business School, was part of the Neighborhood and Long Term Planning Committee's agenda to prepare the Cambridge population for changes in the economic climate.

Participation on Municipal Public Policy Committees

MIT routinely serves on local committees and task forces addressing municipal public policy issues. In 2002 and 2003, MIT officials served on the following City committees:

Cambridge Pedestrian Committee

Cambridge Bicycle Committee

Cambridge Tree Protection Task Force

Cambridge Climate Protection Task Force

Cambridge Local Emergency Planning Committee

Cambridge Rooftop Mechanicals Task Force

Page 10 November 3, 2003

In addition, MIT actively participates in public policy processes by sharing its ideas and concerns and engaging in discussions at various public meetings and hearings.

Annual Cambridge First Day

In 1993, Cambridge First Day was established by MIT President Charles Vest as a way for MIT to formally express its appreciation to the Cambridge community for the productive economic and cultural partnerships that exist between the Institute and public officials, businesses, and residents of Cambridge. That year, MIT honored Cambridge businesses with whom MIT had been working for 50 years or more. MIT then recognized minority- and women-owned Cambridge businesses in 1994, small Cambridge businesses in 1995, Cambridge biotechnology companies in 1996, entrepreneurship in 1997, the culinary arts in 1998, architecture in 1999, the arts in 2000, community building in 2001, services for the homeless in 2002, and the environment in 2003. Since 2000, the four organizations being honored each year have been the recipients of \$1000 gifts from MIT in honor of their work in the community.

Annual Community Service Awards

In 1994, MIT implemented Cambridge Community Service Day, which celebrates the spirit of volunteerism and community service in Cambridge. The reception is held annually at the MIT President's house to honor an individual from Cambridge and a member of the MIT community for exemplary service. Each honoree is asked to select a Cambridge-based charity to which the Institute will give a \$1,000 cash donation.

C. MIT Environmental Initiatives

Environmental Virtual Campus

The Environmental Virtual Campus (EVC), conceived by MIT and the EPA, helps colleges and universities understand how they can achieve compliance through a unique, interactive web site. The EVC allows users to "navigate" the virtual campus and identify the regulatory requirements and best practices applicable to a typical campus. .²

Urban Focus-MIT-Cambridge Public Schools Collaboration on Education for the Environment

MIT and Cambridge Public Schools collaborate to carry out three projects that provide environmental benefits to the local urban area as well as to develop enhanced environmental consciousness among local citizens. Three Cambridge Public School classes partnered with three MIT graduate students to conduct yearlong projects, two related to water quality in the Charles River and Alewife Brook, and one related to alternative energy sources. The projects included two community seminars on the subjects open to other Cambridge students, teachers, and members of the community.²

Stata Center Biofiltration Stormwater System

A biofiltration stormwater system for MIT's new Stata Center building will help improve the health of the Charles River by filtering the stormwater from the roof and surrounding area before it enters the stormwater sewer pipes.

Page 11 November 3, 2003

_

²&² These projects were undertaken by the Massachusetts Institute of Technology in connection with the settlement of an enforcement action brought by the United States Environmental Protection Agency and the United States Department of Justice for alleged violations of the Federal Clean Water Act, the Clean Air Act, and the Resource Conservation and Recovery Act. There was no actual finding of harm to the environment.

Vassar Street Utilities and Streetscape Projects

The Vassar Streetscape project incorporates physical and aesthetic connections among MIT's buildings and public spaces along Vassar Street. As part of the effort, MIT is installing new steam and condensate lines, hot water piping, telephone/data and electrical ductbanks, fire protection water lines, water, sewer, and storm drains, and burying the overhead telephone and electric lines. In addition, MIT has added a bicycle lane, sidewalks, and trees as part of the street reconstruction.

Environmental Programs Task Force Speaker Series

MIT has hosted many programs on environmental themes, such as wind power and solar power. All presentations are open to the public and are intended to raise awareness about current environmental and technical issues on the MIT campus, that mirror issues in other communities.

Cambridge Climate Action Initiative

MIT is assisting the City of Cambridge to achieve the goals set by the Cambridge Climate Action Plan. For example, MIT students took part in an Independent Activities Period (IAP) course in January conducted by the MIT Laboratory for Energy and the Environment (LFEE) that focused on developing proposals for implementing portions of the Cambridge Climate Action Plan in the City. Student groups presented their projects to a review panel consisting of Cambridge City officials, citizens, and members of the environmental community at MIT.

40% Recycling Rate by 2005

As an interim effort toward achieving the goals of the Cambridge Climate Protection Plan, the City and some of the largest employers and institutions in the City have pledged to attain a 40% recycling rate by 2005. MIT is participating in that effort and has made considerable progress.

Students for Global Sustainability "Sustainable Cities Project"

A group of MIT students is assisting the City of Cambridge with a residential energy use project involving surveys of the community about energy consumption. The project will also include distribution of compact fluorescent lights and dissemination of information.

Youth Encounter on Sustainability (Y.E.S.)

The Alliance for Global Sustainability Youth Encounter on Sustainability (Y.E.S.) gathers graduate and advanced-level undergraduate students from around the world for an intensive two-week institute exploring the demands of sustainable development. This initiative is sponsored by the Alliance for Global Sustainability, a consortium of four leading universities - MIT, University of Tokyo, Swiss Federal Institute of Technology and Chalmers University in Sweden. The MIT Laboratory for Energy and the Environment funded participation by four Cambridge teachers at the conference in Switzerland during the summer of 2003. The educators are currently working with staff in the MIT Laboratory for Energy and the Environment to devise ways to integrate what they learned into their classrooms.

Green Buildings

MIT is seeking LEED Certification for the Stata Center, Simmons Hall, and the brain and cognitive sciences building that is now under construction. This designation is part of MIT's commitment to construct buildings that are environmentally sustainable.

Page 12 November 3, 2003

William R. Dickson Cogeneration Facility

The MIT natural-gas-powered 20-megawatt cogeneration facility has provided electricity, steam heat and chilled water to more than 100 MIT buildings since 1995. It uses 28% less fuel and reduces emissions of nitrous oxides and carbon dioxide by more than 70% compared to power plants producing electricity and heat separately. The environmental benefit is equal to removing 12,000 automobiles commuting through Cambridge each morning and evening.

MIT/EPA Charles River Stormwater Design Competition

The objectives of this competition, hosted by MIT, were to increase the visibility of stormwater issues, especially with regard to the Charles River, and to identify easily replicable, innovative strategies to improve the management, treatment, and control of stormwater run-off. The winning project is currently being implemented at a residence in Cambridge.

Debris Recycling

MIT instituted new recycling requirements in 2001 in the Department of Facilities Capital Projects group. In 2001, 96% of the construction and demolition debris from the Media Lab Expansion Project was recycled. In 2003, these standards were again used during the demolition of Building 45 and the East Garage, recycling 96% and 100%, respectively, of the debris from those two projects.

Book Donation Program

MIT's Environmental Programs Office has established a book donation program at MIT, partnering with Hands Across the Water. This program allows books that otherwise would be destroyed or buried in landfills to be redistributed to others who can use them.

Stuff Fest

During Stuff Fest, held at the end of the academic year, students drop off in designated locations a wide variety of belongings and material that they don't need and would otherwise throw out. Other students can pick up the belongings for their own use. Any items remaining are donated to the Cambridge and Somerville Program for Alcohol and Drug Abuse Rehabilitation (CASPAR).

Solar PV Grant Awarded to MIT

MIT's Utilities group joined the Laboratory for Energy and the Environment (LFEE) to forge a new initiative to bring renewable solar power installations to MIT buildings as well as schools, homes and businesses in Cambridge and neighboring towns.

For more information on MIT's focus on the environment, please see the Environment at MIT web site (http://web.mit.edu/environment/) and the Lab for Energy and the Environment's web site (http://lfee.mit.edu/).

D. MIT Support for Community-based Organizations

Introduction

MIT solidly supports community-based organizations that address the challenges Cambridge faces, including improving public education, protecting the environment, and promoting affordable housing opportunities.

Page 13 November 3, 2003

Means of Support

The support provided falls into the following categories:

Institute Representation: MIT staff and faculty serve on a number of committees and boards of non-profit organizations. Through their participation in these groups, they learn how the Institute can better meet the needs of community-based organizations.

Financial Contributions: MIT annually provides financial support to dozens of Cambridge-based organizations. In addition, MIT's **Community Service Fund (CSF)** provides financial resources to local organizations that have MIT student, faculty, and/or staff as volunteers.

Facility Use: The Institute regularly provides meeting and event space for local organizations.

Volunteers: MIT's most valuable resources are its undergraduate and graduate students, staff, faculty, and alumni. This pool of energetic and creative individuals is a key source of volunteers for local organizations.

A Sampling of Programs

Education

Summerbridge Cambridge is a year-round, tuition-free, academic enrichment program in which high school and college students instruct and mentor Cambridge middle school students. Founded in 1992 as the first Summerbridge program to be hosted by a public school system, Summerbridge Cambridge promotes the academic success of low-income children.

MIT staff have participated on the Board of Directors for eleven years. The Institute has played a major role in seeking out financial assistance for Summerbridge Cambridge since its inception.

Environment

MIT and the City of Cambridge share the vision of making the Charles River fit for fishing and swimming by 2005. To this end, the Institute works closely with other members of the **Clean Charles Coalition**, a voluntary association of industries, academic and research institutions, public interest groups, and others. In 1998 MIT, a founding member of the Coalition, purchased a boat to bolster the organization's efforts. Various groups continue to use the boat to remove trash from the river, measure the water quality, and conduct other research.

MIT is committed to increasing environmental awareness through education and support of community-based organizations with a "green" mission. For its 2003 **Cambridge First Day** celebration, the Institute joined with the City of Cambridge to salute the following individuals and organizations for their efforts to protect the environment: Dr. Michael Charney, Mr. Henry Vandermark, CitySprouts, and Zipcar. Each honoree received a \$1,000 cash donation from MIT to be given to an environmentally conscious, Cambridge-based charitable organization.

Housing

Established in 1968 with the help of the MIT Community Service Fund, the **Just A Start Corporation** runs a variety of programs to promote affordable housing and economic self-

Page 14 November 3, 2003

2003 Annual Town Gown Report Update

sufficiency and to prevent homelessness. The agency's accomplishments include stabilizing 250 occupied housing units; providing over 500 nonprofit rental apartments with permanent affordability for families and individuals; and annually developing 10-20 nonprofit rental and first-time homebuyer housing units with strong affordability provisions.

MIT staff have participated on the Board of Directors for the past thirty years. The Institute has provided significant financial support to Just A Start since it was founded. Recently, MIT provided a low-interest loan to Just A Start for the construction of affordable housing units.

Page 15 November 3, 2003

A PARTIAL LIST OF CAMBRIDGE-BASED EVENTS AND ORGANIZATIONS THAT MIT HAS SUPPORTED IN THE PAST FIVE YEARS (1998 – 2003)

Adolescent Consultation Services (ACS) Alzheimer's Association Cambridge Chapter

Area IV Back to School Celebration

Area IV Coalition Area IV Youth Center

Associated Early Care & Education Benjamin Banneker Charter School Boston Area Rape Crisis Center Boston Area Solar Energy Association

Bread & Jams

Cambridge Algebra Project

Cambridge Business Development Center

Cambridge Cares about AIDS Cambridge Carnival International Cambridge Chamber of Commerce Cambridge Climate Calendar Cambridge Community Center Cambridge Community Chorus Cambridge Community Foundation

Cambridge Community Television (CCTV) Cambridge Dept. of Recreation Annual Road Race

Cambridge Election Commission

Cambridge Family and Children's Services (CFCS)

Cambridge Family Safety Day Cambridge Health Alliance Cambridge Historical Society

Cambridge Housing Assistance Fund Cambridge License Advisory Board Cambridge Literacy Collaborative Cambridge Little Baseball League Cambridge – MIT Science Expo Cambridge Multicultural Arts Center

Cambridge NAACP

Cambridge Office of Tourism

Cambridge Office of Workforce Development Cambridge Partnership for Public Education

Cambridgeport Baptist Church Cambridgeport Children's Center Cambridgeport Science Club for Girls Cambridge Peace Commission Cambridge Public Library

Cambridge Public Schools Cambridge Rotary Club Cambridge School Volunteers Cambridge Senior Center Cambridge YMCA Cambridge YWCA Cambridge Youth Hockey

CASPAR

Center for Families of North Cambridge

Central Square Business Association (CSBA)

Central Square World's Fair Charles River Conservancy

Charles River Watershed Association

Citybridge CitySprouts

Community Art Center Community Music Outreach

Concilio Hispano

East Cambridge Little Baseball League

East End House

Friends of Cambridge Athletics

Henry Buckner School

Hildebrand Family Help Center Inner City Scholarship Fund

Jam'Nastics

Just a Start Corporation Kendall Community Group

Margaret Fuller Neighborhood House Maud Morgan Visual Arts Center MIT Habitat for Humanity

MIT Museum Cambridge Community Outreach

MIT Public Service Center Fellowships

Mount Auburn Hospital

National Federation of the Blind Cambridge Chapter

Neighbors for a Better Community

Nora Theater

North Cambridge Crime Task Force

On the Rise Parents Forum Project Manna

Reach Out - Teach a Child to Read Ruth L. Barron Memorial Scholarship

Saint Paul A. M. E. Church

Shelter, Inc. Solutions at Work Summerbridge Cambridge

The Cambridge Youth Guidance Center

The Dance Complex

The Salvation Army Cambridge Chapter

The Women's Center Training Innovations **Tutoring Plus**

Underground Railway Theater **Volunteer Community Connections** Windsor House Adult Day Care Service

Youville LifeCare

Page 16 November 3, 2003

E. MIT Collaboration with Cambridge Public Schools (CPS)

Introduction

Partnering with Cambridge Public Schools to enhance the educational experience of students and teachers is a natural extension of MIT's mission. By providing tutoring, mentoring, and curriculum and professional development, the Institute sees its connection to CPS as a priority.

The Institute is looking forward to forging a strong relationship with Superintendent Dr. Thomas Fowler-Finn and finding additional initiatives on which to collaborate.

Various departments and offices across the Institute have created educational outreach programs for CPS. Detailed below is a sampling of new initiatives as well as information on a selection of long-standing programs that continue to thrive.

A Sampling of New Educational Initiatives

The Edgerton Center

Science Technology & Engineering Education through Robotics (STEER)

Started in the summer of 2003, this eight-week Saturday program targets students entering the sixth through ninth grades. Students have the chance to explore robotics and design through a variety of activities and competitions. Of the nine students total who participated, seven were from CPS.

The Office of Government and Community Relations (OGCR)

Hosting of CPS Events

In August 2003, OGCR hosted a dinner retreat for the Cambridge School Committee and the new Superintendent. In addition, as on four previous occasions, OGCR provided a meeting space for CPS teachers and school leadership to kick-off the academic year. Approximately 1,200 teachers and administrators gathered in Kresge Auditorium to hear an address by Dr. Fowler-Finn, which offered an introduction to the new school year and to the Superintendent's guiding philosophy.

Whenever possible, MIT makes its meeting rooms, facilities, and staff development resources available to CPS.

The Public Service Center (PSC)

iMath

iMATH is a program currently being developed by the Public Service Center in collaboration with MIT undergraduate students and CPS. With a focus on eighth graders who need assistance grasping mathematical concepts, this after-school program will use interactive internet-based activities to advance learning. For its pilot semester, Fall 2003, iMATH is working with two elementary schools, the Morse School and the Cambridgeport School. The iMATH program hopes to work with 10-15 students from each of the two schools as well as involve ten MIT volunteer student mentors. iMATH brings CPS and MIT students together on a weekly basis for one-hour meetings and runs from the second week in September through the last week in November.

Page 17 November 3, 2003

The School of Engineering

Saturday Engineering Enrichment and Discovery (SEED) Academy

This is an academic year, college preparatory and career exploration program for Boston and Cambridge public high school students interested in math, science, and technology. Started in March 2002 by the MIT School of Engineering, the SEED Academy offers participants hands-on learning in mechanical, civil, aeronautical, and astronautical engineering. MIT graduate student instructors and undergraduate tutors serve as positive role models and engage the students in curriculum activities that are based on the Massachusetts Curriculum Framework. Of the 37 tenth and eleventh grade students currently enrolled in the program, ten of them are from the Cambridge Rindge and Latin School.

A Sampling of Long-Standing Educational Programs

The Center for Materials Science and Engineering (CMSE)

MIT Research Experience for Teachers (MRET)

Since 1999, the Center for Materials Science and Engineering has offered middle, junior high, and high school science teachers a seven-week opportunity to conduct materials research on campus. The teachers are matched with a CMSE faculty member and his or her team of graduate students and postdoctoral researchers. After completing the first summer, the teachers are encouraged to return to CMSE for a second summer to create classroom lesson plans and lab modules based upon their research. Cambridge teachers have been consistent participants in this program.

Science and Engineering Program for Middle School Students

Since 1992, CMSE has provided seventh and eighth grade students from two Cambridge public elementary schools with hands-on exploration of science and engineering (e.g., at the Edgerton Center). A group of students and the science teacher from each school spend a week in the summer on campus participating in activities that are designed and taught by MIT faculty, technical staff, graduate students, and undergraduates. The Cambridge students and teachers return for several after school sessions during the academic year. Since the program's inception, 182 students have participated.

The Edgerton Center

You Go Girl!

Developed in 1997, You Go Girl! is a four-day summer program targeting girls entering the ninth grade. Participants engage in hands-on science projects, as well as activities that promote personal development, high school and college preparation, and career planning. Since the program's inception, CPS students have been consistently represented.

In addition to You Go Girl!, the Edgerton Center has educational activities for fourth through eighth grade students. Many of the activities in this outreach program reinforce classroom curriculum concepts. The Center has about 75 CPS classrooms visit per year. It also sponsors activities for about 60 community and MIT groups annually.

The MIT Museum

The MIT Museum has a variety of exhibits and hands-on educational programs for K-12 students and teachers. Groups from CPS can have free, self-guided visits to the Museum (special programs have a fee). The Museum also is a tour site for the Cambridge Science

Page 18 November 3, 2003

Expo. In addition, teachers can participate in workshops that focus on ways to use the Museum's galleries to teach history, math, art, and social studies through the sciences.

The Museum makes a special effort to engage local families in its programs at low or no cost. The Friday After Thanksgiving (F.A.T.) program is a hands-on educational activity designed as a creative alternative to entertain children during the holiday weekend. The Family Adventures in Science and Technology (F.A.S.T.) program gives the general public the chance to learn about the research that MIT faculty and graduate students are involved in.

In addition to free monthly brown bag gallery talks, the Museum offers free admission every third Sunday and on special occasions for Cambridge residents, including MLK Day.

The Office of Government and Community Relations (OGCR)

Community Service Fund (CSF)

As mentioned earlier, the Community Service Fund reinforces the talent, time, and effort that members of the MIT community dedicate to community service. CSF has consistently supported local programs and organizations that have an educational mission, such as Cambridge School Volunteers and The Algebra Project.

Keypals

For more than seven years, this e-mail exchange program – facilitated by Cambridge School Volunteers – has paired CPS sixth grade students one-on-one with employees of MIT, Draper Lab, and IBM. The correspondence between the adults and students is intended to improve students' writing and computer skills, as well as heighten their awareness of the link between education and career choices. The Keypals discuss students' writing assignments, including biographies of the adult Keypals, timelines of personal and world events, geography research projects, poetry, and other topics. In addition to e-mailing each other, the Keypals have face-to-face meetings during the school year: two student visits to the adult Keypal's workplace, a breakfast meeting at the school, and an end-of-year celebration. Since its inception, over 800 CPS students have participated in the program.

The Public Service Center (PSC)

Fellowships: Independent Activities Period (IAP)

The PSC offers MIT students fellowships, so that they may channel their knowledge and skills into community service. The IAP Fellowship, which spans the month of January, focuses on science education in CPS. Through PSC funding, MIT students are paid to assist teachers with science projects and work with them to design math, science, and technology curricula.

Keys to Empowering Youth (KEYs)

Started in 1993, KEYs is a motivational program that brings eleven- to thirteen-year-old girls together with MIT women students to participate in workshops throughout the school year and once over the summer. Workshops such as "Moving Beyond Stereotypes," "Women's Health and Medicine," and "The Environment and You," are designed to enhance self-esteem and stimulate interest in science. KEYs recruits heavily in the Cambridge community through the schools and local community organizations dedicated to children and families.

ReachOut

A national AmericaReads program was implemented at over one thousand colleges and universities in 1997. ReachOut is the MIT branch of this program. Co-sponsored by the

Page 19 November 3, 2003

Public Service Center and the MIT Student Employment Office, ReachOut recruits, trains, and matches tutors with children who need help with reading. MIT ReachOut tutors work with approximately 60 Cambridge children each semester. The program partners with the Cambridge Community Center and the Cambridge Family YMCA.

Science Expo

Started in 1993, this showcase of CPS students' science projects is a successful collaboration between schoolchildren and MIT students. Over 250 MIT students volunteer at this event each year, leading laboratory tours, discussing the science projects with the 200-300 seventh and eighth graders, and serving as positive role models.

SciPro

Originally called "Science Projects at MIT" when it began in Boston in 2001, SciPro is expanding to serve economically disadvantaged, minority eighth- and ninth-graders in CPS. The PSC received a three-year, \$100,000 grant from the 484 Phi Alpha Foundation, established by the alumni of the MIT chapter of Sigma Alpha Epsilon, to pilot this mentoring program in Cambridge this fall. MIT students serve as science advisors working with youth on experiments that they select. Additional activities include science demonstrations and field trips. SciPro meets on the MIT campus and takes advantage of resources, such as the Edgerton Center and the MIT Museum.

Page 20 November 3, 2003

IV. FUTURE PLANS

On page 12 of the Town-Gown Report, the members of the Town-Gown Committee agreed that "Universities should offer statements of their future needs to the City and plans responding to those needs. These plans should include specific statements about known development projects and their status; forecasts of faculty, staff or student population growth; and identified needs that do yet have solutions . . . These plans should address known concerns of the community, such as parking and/or tax base erosion."

Describe your institution's current and future physical plans:

- Employ a planning horizon of ten years;
- Describe the broad goals of your plans and the primary needs that you address through your plans (e. g., housing needs of staff or of students, encourage interdisciplinary research, etc.);
- Identify and describe plans for future development on the various districts of your campus (coordinate with Map 3 in Section VI);
- Include in your discussion the relationship of planned and projected institutional development to adjacent residential districts within Cambridge and any impacts that might result;
- Include in your discussion the relationship of planned and projected institutional development to adjacent retail and commercial districts within Cambridge and any impacts that might result (e. g., loss or relocation of retail space, etc.);

To the extent feasible, your narrative should also include the following specific information:

- Project and describe anticipated changes in your employee and student populations;
- Project and describe anticipated changes to your housing stock;
- Project and describe anticipated changes to your parking stock;
- Describe any needed property acquisition and disposition.

Please provide copies or summaries of any institutional plans shared with community groups within Cambridge.

A. Introduction

MIT is the quintessential American research university, and the world's preeminent institution focused primarily, though not exclusively, on science and engineering. We are dedicated to serving our nation and world by discovering fundamental knowledge of the natural, social, economic, and aesthetic realms; by working in concert with others to bring this knowledge to bear on the world's great challenges; and by preparing a highly talented and diverse group of students to deeply understand science and engineering and developing their ability, values, and passion to apply this knowledge wisely and creatively to the betterment of humankind.

President Charles M. Vest, The Path to Our Future, 1998

Understanding the planning and physical development of the campus requires understanding some of the key financial dynamics that affect the Institute in carrying out its core mission. The

Page 21 November 3, 2003

image of the university as an oasis of stability, reflection and resources, exempt from financial and competitive pressures, does not accurately depict the current reality of higher education.

B. MIT Finances and Campus Planning and Development

The following is a summary of key financial issues that the Institute is facing:

- Tuition has been providing about one quarter of the revenue supporting MIT's operating budget since the 1980s, while research has dropped from over one half of MIT's revenue to about one third over the same period. Fortunately, gifts and increases in the endowment have filled that gap, now providing over 40% of the necessary revenue.
- The value of MIT's endowment grew steadily from about \$1.4 billion in 1990 to \$4.2 billion in 1999, and then increased dramatically to \$6.3 billion in 2000, but has since declined for three consecutive years by about \$1.3 billion.
- MIT tripled its debt from almost \$300 million to more than \$900 million, primarily to finance the capital building program.

There are several operating expense increases that have driven annual costs higher:

- Providing greater support to graduate students (Research Assistant/Teaching Assistant tuition subsidy, not charging summer tuition for most graduate thesis students, graduate fellowships)
- Substantially increasing financial aid for undergraduates (e.g., the average MIT scholarship grant has doubled in the last five years)
- Renovating and renewing facilities, including offices and laboratories, classrooms, student residences, health and safety systems
- Increasing debt service and operating costs for new academic, residential, and recreational facilities
- Increasing health care costs
- Rising pension fund contributions

This squeeze of decreased revenue and increased costs has required MIT to cut its budget for the current year by \$35 million. MIT intends to cut next year's budget, starting July 1, 2004, by \$70 million. A salary freeze is in place and as many as 250 positions will be eliminated.

In the past, federal research funding was the Institute's primary financial driver; now, MIT is more dependent on the growth of the endowment and private gifts than ever before in its history. This makes the Institute more vulnerable to market reverses and the impact of the economy on charitable giving. MIT has made great use of the increase in these private resources by investing for the future and staying globally competitive.

Large projects requiring substantial debt financing will likely be deferred. Fundraising for projects, such as the Media Lab Extension and the East Campus Project, has slowed, leading to cost reduction efforts or slowing of project development, or both. The renovation and renewal program will also slow, at least in the short term. Despite competitive pressures to continue to improve academic and student life facilities, a major new wave of projects similar to the capital program of the past few years is unlikely. There will be some projects that bring new resources, provide strategic academic opportunities, and pass through the rigorous priority setting process that is incumbent on all current initiatives.

Page 22 November 3, 2003

C. Growth of the Student Body and Housing

The explosive growth of the student body of the Institute took place after WWII, as the total number of students doubled from 3,100 to 6,271, with the number of graduate students more than tripling from 721 to 2,691 between 1940 and 1960. From 1960 to 1980, there was a 44% growth in the number of students bringing total student numbers to over 9,000, split evenly between undergraduates and graduate students.

Since 1981, the total number of students is up 952, a 10% increase in 22 years. This is a growth rate of less than one half of one percent per year. Over this same period, MIT has created an additional 1,410 beds of student housing, providing housing for every additional student admitted and making progress in increasing the percentage of all its students housed in MIT-approved housing. The increasing cost of housing in the Boston area hurts the competitive position of MIT, just as all businesses are disadvantaged. Because so many of the students and faculty are continually arriving from outside the area, indeed, from around the world, the steep cost of housing is a particular shock. MIT is under continuing pressure to provide housing for its students to ward off the disadvantage of the tight metropolitan housing market.

The Cambridge housing market has softened over the last year or two, rents have dropped and vacancies have increased. This has resulted in an increase of approximately 4% of graduate students living in off-campus housing in Cambridge, even as the 70 Pacific Street Graduate Student Residence opened in the fall of 2002.

Most of the older graduate and undergraduate residences on campus need substantial renovation, with only a few exceptions, such as Senior House and Baker House, which have both had recent renovations. The Institute is exploring alternatives for expanding housing opportunities, possibly including renovations to bring all of its housing up to a standard which is competitive with its peers and appropriate to a great university.

It is worth noting that while there is some generous donor support for student housing, it has been primarily financed with Institute debt. The costs of land, construction and the development process are very steep. The densities allowed by zoning in some areas are relatively low. The rents that would fully support both the operating and debt service costs of new residential facilities need to be set at the limits of what the overall student market can afford. The housing produced must continue to be competitive with the amenities and rents found in the market in nearby neighborhoods. As noted above, access to capital is also constrained in the near term. The Institute is investigating how each of these constraints can either be satisfied or where changing one or another of them could support a successful project.

Notwithstanding these constraints, MIT finds that the students it attracts have increasing requirements for housing and other student life amenities, such as sports and athletic facilities, student centers and performing arts venues. The number of undergraduate students who have been admitted to MIT yet choose to go elsewhere, citing housing and the quality of the campus facilities as their number one reason, has grown in recent years. It was the third most cited reason in 2000 (behind costs and academic concerns) and moved to number two in 2001.

D. Campus Planning Challenges and Opportunities

The Planning Board has posed questions regarding MIT's current thinking about two particular areas bordering MIT: the Cambridgeport industrial area and the Osborn Triangle. In 2002, MIT worked with the Cambridge Historical Commission to conduct a detailed historic inventory of the industrial property along the edge of the campus, which focused on Cambridgeport and the Osborn Triangle.

Page 23 November 3, 2003

Cambridgeport Industrial Area

While there have been a number of studies looking at various options in Cambridgeport, MIT does not have a specific master plan for the area. The Institute considers a variety of factors.

This area has several commercial property owners, a range of property conditions, from unrenovated industrial to new laboratories, and low FAR residential zoning (see Map #2). The MIT-owned property is primarily in Special District 8 and 8A. The distance from the major academic portions of the campus tends to discourage research or teaching facilities in this area. Even temporary parking uses are less popular, because of the distance to most offices and laboratories. An administrative use that could functionally be remote from campus, like the existing mail handling facility at 350 Brookline Street, could be considered for this area, but there are no plans for a new administrative facility anywhere on campus.

70 Pacific and 224 Albany Street graduate residences have demonstrated the viability of the area north and west of the MIT main campus as a housing location. However, these properties are proximate to University Park and the MIT campus in a way that property further west is not. The commercial and industrial buildings in the area further to the west (many of which are not owned by MIT, and a number of which have been recently constructed or renovated) make it difficult to create the kind of lively, mixed-use community, with neighborhood-serving retail and 18-hour activity, that would be most desirable in this part of Cambridge.

Despite these challenges, this area and other areas of campus have been considered by MIT urban design studios for conceptual locations for a variety of potential housing types, including dormitories, student apartments and staff/faculty housing.

The railroad tracks, with their existing use for freight and the MBTA, provide a significant barrier to the incorporation of any uses into the MIT campus. The MBTA, as part of the Urban Ring, has proposed an eastbound Bus Rapid Transit (BRT) line in the rail corridor and a westbound line on Waverly and Albany, operating at eight- to ten-minute headways. The Cambridgeport stations are tentatively located on MIT property. In addition, the City is studying the feasibility of a regional multi-use path in this corridor. The development of this corridor with rapid transit will tend to further separate the northwest and west areas and make housing directly adjacent to the transit corridor areas less attractive.

A pedestrian crossing at Pacific Street, behind 224 Albany Street, would be one way to increase the interaction between the northwest sector and MIT. In addition, MIT would like the City to consider the Vassar Street sidewalk and cycle track in place of the Grand Junction route. A large investment in improving Vassar Street is being made, with a specialized bicycle facility that is directly in line with the proposed multi-use path north of Main Street. This would put pedestrians and cyclists on an attractive, well lit, and safe street, that is already in the public realm.

MIT Investment Property in the Osborn Triangle

There are several MIT investment-owned parcels in this area (See Map # 3):

Along with other smaller parcels towards Central Square in a mix of academic and investment uses, including the recently renovated MIT Museum, MIT owns a number of parcels and properties.

There are no plans to expand or change the existing uses of the mixed-use restaurant and residential building at 782-798 Main Street.

Page 24 November 3, 2003

The former Polaroid building at 600-624 Main Street remains in the Institute's investment portfolio and a tenant is being sought. The expansion and historic rehabilitation of the TKT Building at Osborn and Main Streets has recently been completed. This property is under long-term lease to TKT, the sole tenant. The vacant industrial buildings at 730-750 Main Street are intended for renovation for commercial tenants and for long-term investment. The 750 Main Street location was acquired in June 2003.

The Analog Devices Building on Osborn Street is also a long-term investment, under the control of Analog Devices for many years.

Vassar -Albany Corridor, Main Group and East Campus Redevelopment

There are also some major challenges on campus, including the use and development of the Vassar/Albany Corridor, the preservation and renewal of the Main Group of original MIT academic buildings, and the redevelopment of the blocks behind the historic buildings on Main Street.

Vassar - Albany Corridor

South of the Cambridgeport industrial area and the Osborn Triangle runs the Vassar-Albany corridor. Starting at 230 Albany Street and heading east, all of the property from Albany to Vassar is in MIT ownership including the entire former railroad right of way. (The rail tracks operate under an easement from MIT to CSX Transportation.)

There are several challenges and opportunities in this area:

Compared to much of the campus, it is relatively underdeveloped, with parking lots, garages and utility uses predominating. As the brain and cognitive science project demonstrates, the air rights above of the tracks are a good place for density and large floor plates. Concentrating development on land the Institute already owns requires making use of development capacity where it exists.

The proposed Urban Ring line and the multi-use path in the corridor squeeze and, in some cases, eliminate MIT's potential building and existing and potential service uses to the buildings along this corridor. In addition, these public transportation uses divide the campus between the north and south. MIT will continue working with the City and the MBTA to favorably resolve these issues.

While MIT continues to be very supportive of the Urban Ring Project, the Institute remains concerned about the environmental impact on the sensitive nanotechnology, magnetic, and cellular research activities that are sited away from the street toward the currently infrequently used rail corridor.

There is an opportunity to improve the gateway parcels along Massachusetts Avenue between Albany and Vassar Streets. The potential Music and Theater Arts Teaching Laboratory (see Map # 4 and Project Section description) would be a step in the right direction. The redevelopment of these parcels is complicated by the proposed MBTA Urban Ring stations at Massachusetts Avenue.

Behind the gateway parcels, moving east, are existing and contemplated new utility uses. Continuing service access to these facilities is critical for the MIT utility system. Placement of these uses and the service of them on the interior of this long block would be consistent with municipal aesthetic and urban design preferences.

On both sides of Massachusetts Avenue are existing surface parking lots and aging garages. There are no current plans (except possibly the Music and Theater Arts Teaching Laboratory)

Page 25 November 3, 2003

to either remove this parking or rehabilitate the parking structures. With the opening of the Stata Center and the brain and cognitive sciences project, there will be more scrutiny of these sites and consideration for higher uses than parking.

Main Group

These are the original buildings of the MIT Cambridge campus, dating from 1916. Nearly a century after its completion, the original Main Group is vital and relevant, both architecturally and programatically. MIT is now engaged in a planning process that will sustain the Main Group in the 21st Century. The Green Center for Physics (see Projects section) will be the first project to employ these evolving principles:

- Preserve the historic fabric of the original buildings
- Conserve the original planning principles of the Infinite Corridor
- Upgrade and organize building systems for future adaptability
- Provide for future program flexibility
- Encourage greater use of public spaces

East Campus Redevelopment

The area between Carleton and Wadsworth, behind the historic Main Street buildings has long been seen as a redevelopment area, but no specific program has yet emerged to make use of it. It was considered for the Sloan School and School of Humanities, Arts and Social Sciences expansion, also called the East Campus project, but ultimately discarded in favor of the current proposed site directly adjacent to Sloan.

As noted in the Projects section below, MIT is considering two parking-related projects that would precede the academic projects that emerge in this area. The first is the demolition of the Hayward Garage and its temporary replacement with surface parking. The other is the planning for an eventual underground parking structure between Carleton and Hayward Streets. This garage would be tied to the development of an academic project in this location.

The necessity of demolishing the Hayward Garage will provide an opportunity to begin exploring the urban design possibilities in this area.

Page 26 November 3, 2003

V. PROJECTS

Your narrative should also include the following project specific information:

- List all development projects completed within the past year, currently in construction or which will require City permits or approvals during the next three years (coordinate with Map 4 in Section VI);
- Indicate how each project meets the programmatic goals of your institution discussed in Section IV:
- Indicate how each project fits into the physical plans for the immediate campus area;
- Indicate identified future development sites on your campus (coordinate with Map 5 in Section VI).

A. Residential and Student Life Projects

Simmons Hall

This new student residence on Vassar Street features spaces for integrated social, educational, recreational and dining activities. The dormitory has been designed to accommodate 350 students. The students moved into Simmons in the fall of 2002. Work on the dining hall, first floor common area and basement was completed during the school year.

70 Pacific Street Graduate Residence

The 750-bed capacity graduate student residence on the corner of Sidney and Pacific Streets also opened in the fall of 2002. Along with the 190-bed Edgerton House on Albany Street and the 120-bed 224 Albany Street graduate residence, a true center for student life in the northwest area of the campus has been created, forming a community of students, faculty, and visiting scholars.

Baker House

The final phase of the renovation of this historic building was completed in 2003.

The massive commitment of Institute resources to these housing projects is a part of fulfilling the goals of the 1998 report of MIT's <u>Task Force on Student Life and Learning</u>. The housing and community-building goals of the Task Force report continue to provide guidance in implementing changes to student life on campus.

The Zesiger Sports and Fitness Center

The "Z" Center opened in the fall of 2002. It integrates and supplements existing athletic facilities and contains MIT's principal fitness center, swimming, squash courts, multi-activity courts, competitive team and sports medicine programs.

The Music & Theater Arts Teaching Laboratory

This proposed building is a long-desired teaching facility for musical and theatrical disciplines. This facility would be primarily for rehearsal and teaching and is not planned as a performance venue. The building program calls for approximately 36,000 gross square feet. A siting study was completed in 2003, which concluded that the parking lot at the corner of Albany Street and Massachusetts Avenue, just north of the railroad tracks, would be the optimal location. It would act as a gateway to the campus and would be reasonably

Page 27 November 3, 2003

close to Kresge Auditorium, the primary performance space on campus. The project will be considered for further design work pending progress on fundraising.

B. Enhanced Academic Facilities

The Stata Center

The Center will form a new campus gateway at the intersection of Main and Vassar Streets, and will house the computer, information and intelligence science laboratories in order to support potential new collaborations and innovations. Frank O. Gehry Associates designed the Stata Center and Skanska is the construction manager. Because of its non-traditional and eye-catching design, the building has the potential to become a new landmark for the City of Cambridge. The underground garage associated with this building is now open. The complete building is scheduled for occupancy in winter 2004.

Brain and cognitive sciences project

This new facility will be the home of the Department of Brain and Cognitive Sciences, the McGovern Institute for Brain Research, and the Picower Center for Learning and Memory. It has been designed by Charles Correa Associates and Goody, Clancy Associates and is being constructed by Turner Construction Company. These disciplines are currently housed in various locations, including some leased space. Construction started in April 2003 and at this point in time steel is being erected. The targeted completion date is September 2005.

Building 18 – Chemistry Renovation

The final phase of the renovation of this I.M. Pei building was completed in 2003.

The Media Lab Extension

This facility will include computer labs, student and faculty offices, meeting space and exhibition spaces. The project required demolition of both E10 and E20 to accommodate a facility comprised of three major research centers. The designer of the Media Lab addition is architect Fumihiko Maki of Tokyo, with Leers Weinzapfel of Boston as associate architect. The new addition will accommodate a growing educational program in media studies.

The project was ready for a building permit in the summer of 2002, when MIT determined that more funding needed to be in place before construction could begin. Since that time, the Institute has proceeded on two fronts to move this project forward. While fund raising has proven to be more challenging than anticipated, significant progress has been made. In addition, there have been substantial cost-saving changes to the interior of the building, including the elimination of an entire basement floor level. The exterior of the building is nearly unchanged, preserving the outstanding design created by Maki & Associates and Leers Weinzapfel Associates.

The Planning Board approved a minor amendment to the existing special permit in September 2003. The principal exterior change to the design was the removal of the areaways on three sides of the building, along with the laboratory floor to which the areaways were providing light and air. Despite the loss in program space, this is an improvement to the urban design of the building.

A new bid package is being prepared. With firm construction numbers and further progress on fund raising after the first of the new year, MIT will determine if construction can begin in spring 2004.

Page 28 November 3, 2003

East Campus Project

An addition to the Sloan School of Management and a renovation of facilities for the School of Humanities, Arts and Social Science (SHASS) will accommodate the expanding needs of both Schools on the East Campus in order to provide enhanced teaching and learning spaces. This project has been sited on the eastern-most block of the campus, adjacent to the existing Sloan facilities. The project is on hold while fund raising is proceeding. It is expected that the 300+ parking spaces in this area will be relocated underground.

Green Center for Physics

Through a new project involving space swapping with other departments, renovation and new construction, the Physics Department will be able to consolidate its space, now spread throughout thirteen buildings on campus. About a third of the program space will be provided by new construction of an infill building in the courtyard framed by Buildings 2, 4, 6, and 8. A small building (6A) would be demolished to make way for this new construction. The feasibility assessment for this project has been completed and schematic design has begun.

C. Public Improvement Projects

The City is actively making improvements to infrastructure throughout Cambridge. MIT is an active participant in, and contributor to, several of these major projects. The capital contributions from MIT are substantial and reflect the Institute's interest in doing its part to improve the quality and safety of the infrastructure that we all use and share.

Vassar Street Enhancements

The rebuilding of Vassar Street is intended to improve the pedestrian, bicycle and vehicular environment of the roadway from Audrey Street near Memorial Drive to Main Street. This is the first major project to implement the landscape design guidelines provided by the Olin Partnership to MIT. The Institute, with the support and cooperation of the City, is undertaking major improvements, including landscape and streetscape enhancements, pedestrian and bicycle paths, traffic calming strategies, and consolidated utility lines, to form a residential street. This project has been split into two phases: Vassar East and Vassar West, divided at Massachusetts Avenue.

Vassar East is nearly complete. Some additional work in the Vassar Street/Main Street/Galileo Way intersection is planned for construction in the spring. Vassar West had originally been planned to start in 2005, in part to avoid the reconstruction of Massachusetts Avenue, the Cambridgeport Roadways project and the MDC Memorial Drive project. The current schedules for the Massachusetts Avenue and Cambridgeport Roadway jobs may result in difficult traffic conditions around the campus in 2005. Coordination discussions with City officials are underway.

Cambridgeport Roadways Project

MIT, in conjunction with the City and Forest City Development, has contributed land and money for the construction of a new roadway through Cambridgeport that will facilitate the flow of vehicles from University Park and surrounding areas. This project is now underway.

Department of Conservation & Recreation (DCR) Memorial Drive Historic Parkways Initiative

DCR (a new state agency that absorbed the old Metropolitan District Commission), in partnership with MIT and NSTAR, has removed a lane of eastbound traffic on Memorial

Page 29 November 3, 2003

Drive in front of MIT and most of the existing parking on the eastbound side to extend the riverside park and promenade area. In addition, the long-sought signalization of Massachusetts Avenue and the Memorial Drive off ramps will be constructed. MIT has contributed the construction documents it developed for the intersection improvements to be amended and integrated into the Parkway project. MIT contributed an additional \$565,000 for the project. Phase I of this project (the civil and roadway work) is under construction.

Cambridge Drainage Projects

There are three City drainage lines for the Cambridgeport district that are planned to cross MIT property.

MIT constructed a storm water drainage connection from Vassar Street down Audrey Street (a private way) to two former river-water cooling pipes. In accordance with the Institute's Storm Drain agreement with the City, MIT is giving these improvements to the City without charge. The City will make some additional improvements in the manholes as soon as the property transfer takes place and put the new outfall on line.

The City has proposed two new municipal storm drain lines. One is adjacent to athletic fields and facilities near Johnson Athletic Center and Kresge Auditorium, connecting to the existing Danforth Street outfall. The other drain line is proposed for the West Parking Lot, Amherst Alley and adjacent to Next House. The City is designing these improvements now and plans to propose specific easement agreements later this year.

D. Utility Infrastructure and Parking

MIT intends to maintain its parking inventory by replacing or rehabilitating aging garages and parking lots on valuable campus locations and to expand and upgrade its utility infrastructure to keep pace with its building program.

Utility Plant Expansion

The growth of campus demand for steam, chilled water and electricity requires development of additional power at the Central Utility Plant. This spring a temporary emergency boiler will be installed outside N16A, north of the railroad tracks, to provide back-up capacity in the event that one of the existing boilers goes off-line. There is an investigation of the need for an expansion of the cogeneration system to provide additional permanent capacity to serve the currently planned building projects.

Parking

MIT has not added any net new parking spaces in more than a decade. In recent years, large numbers of parking spaces have been either temporarily lost to construction or permanently displaced. MIT intends to restore parking spaces temporarily out of service and to relocate permanently displaced parking spaces. Where possible and financially feasibly, parking will be located underground, freeing up land for academic and campus development.

The Hayward Garage, containing 141 parking spaces, is slated for demolition next year, to be temporarily replaced by surface parking. This location is an important future academic development site, but the time frame for any new construction has not been established.

There are several vacant lots that are tentatively planned for parking as interim use, including the former Cambridge Tire lot (now a staging area for campus construction) and minor extensions of existing lots. These are required to recover the parking spaces displaced by the capital building program or otherwise permanently removed from the parking inventory.

Page 30 November 3, 2003

2003 Annual Town Gown Report Update

The Hayward parking lot, between Hayward and Carleton Streets, is another potential academic development site. Following some complicated space relocations, the existing buildings, E32, E33 and E34 are expected to be demolished as part of the redevelopment of this block. A large underground garage is anticipated to be constructed under a new academic development absorbing the 200+ existing parking spaces and capturing the last of the parking spaces displaced by the capital building program.

Page 31 November 3, 2003

VI. MAPPING REQUIREMENTS

Please attach to the report maps of the following:

1. Map of all real estate owned in the City of Cambridge. Categorize properties by use as appropriate (e. g., academic, dormitory, commercial investment, etc.).

See Map #1

2. Map of real estate leased. Categorize properties by use as appropriate (e. g., academic, dormitory, commercial investment, etc.). This map can be combined with the one above.

See Map #1

3. Map of future development districts on your campus.

See Maps #2 and #3

4. Map of development projects completed within the past year, now underway, proposed or planned within the next three years.

See Map # 4

5. Map of identified future development sites on your campus. This map can be combined with the one above.

See Maps #2 and #3

Page 32 November 3, 2003

VII. INSTITUTION SPECIFIC QUESTIONS

The Planning Board raised the following questions in the course of its Town Gown discussions during the Winter and Spring of 2003. To the extent feasible, please respond to each question addressed to your institution.

Massachusetts Institute of Technology

- 1. Provide information on building projects earlier, before designs are well advanced.
 - Special Permit projects are typically submitted for permitting after schematic design. Permitting is undertaken when internal approvals have been obtained.
- 2. Is there a master plan for Cambridgeport land between Sidney Street and the main campus? Identify any plans, noting sites, density and uses, and schedule for this area. Is housing still proposed in this area?
 - See Section IV, Future Plans, Campus Planning Challenges and Opportunities
- 3. What are possible development sites between Massachusetts Avenue and Main Street; the "North Campus" area? Right now there is a lot of MIT investment property in the area, some with significant development potential.
 - See Section IV, Future Plans, Campus Planning Challenges and Opportunities
- 4. The graduate student population has grown 25% since 1981, averaging 65 additional students per year. What are the plans to accommodate past and future increases in the graduate student population?

See Section IV, Future Plans, Student Growth and Housing

Page 33 November 3, 2003

2003 Annual Town Gown Report Update

VIII. Maps and Appendices

Map 1: MIT Property in Cambridge

Map 2: The Evolving MIT Campus

Map 3: MIT Construction Projects

Appendix 1: Transportation Survey Instrument

Appendix 2: Transportation Survey Results

Page 34 November 3, 2003



Date: October 15, 2002

To: MIT Community

From: Stephen Immerman

Director, Enterprise Services

Subject: Commuting to MIT

We need your help.

The Parking and Transportation Office, the Environmental Health and Safety Office, Facilities, the Office of the Provost and the Center for Transportation Studies and Logistics are jointly sponsoring a survey on Commuting to the MIT campus. Beside needing to know how you get to MIT every day, this survey also gives us the opportunity to find out if the services we offer (subsidized public transportation, bicycle racks, parking access, etc.) are meeting your needs.

The State of Massachusetts and the City of Cambridge require that MIT collect data related to who commutes to campus and how. The collection of this information helps us do our part to not just comply with state and regional regulations, but also to do what we can to help reduce automobile congestion and associated carbon dioxide emissions.

To comply with state and city regulations and assist MIT in the evaluation of various transportation programs, we are asking you to fill out this survey. The survey is completely voluntary. You may answer as few or as many questions as you wish. The results of this study will be reported in statistical and summary form.

Thank you for your participation.

2002 Transportation Survey

1.	V	
_	Your local Zip Code	Please don't leave these questions blank. We need this
2.	V I I 0%	information to effectively evaluate the commuting
	Your local City	patterns of our employees, students, and guests.
3.	Varia land Ctata	
4	Your local State Your Gender	
4.	Male	
	☐ Male ☐ Female	
5.	Your affiliation with MIT	
5.	Faculty	☐ Service staff
	Other academic staff	☐ Medical staff
	Research staff	Student: undergraduate
	Administrative staff	Student: undergraduate Student: graduate
	Support staff	Other (please specify)
6.	Is MIT your primary employer/school?	Unlei (please specify)
0.	Yes	☐ No, I am a visitor
	☐ No, I am a student at another institution	Other (please specify)
	☐ No, MIT is my secondary employer	☐ Other (please specify)
7.	What time do you usually arrive on campus?	
* •	Before 6:00 AM	□ 8:00-8:30 AM
	☐ 6:00-6:30 AM	8:30-9:00 AM
	☐ 6:30-7:00 AM	9:00-9:30 AM
	☐ 7:00-7:30 AM	9:30-10:00 AM
	☐ 7:30-8:00 AM	After 10:00 AM
8.	Why do you choose that time to arrive on campus?	
••	☐ Work/class schedule	☐ I am able to set my own schedule
	☐ Transportation schedule	Other (please specify)
	Other responsibilities (e.g. personal obligations)	_ c.i.e. (p.cace specify)
9.	What time do you usually depart from campus?	
	☐ Before 4:00 PM	☐ 6:00-6:30 PM
	☐ 4:00-4:30 PM	☐ 6:30-7:00 PM
	☐ 4:30-5:00 PM	☐ 7:00-7:30 PM
	☐ 5:00-5:30 PM	☐ 7:30-8:00 PM
	☐ 5:30-6:00 PM	After 8:00 PM
10.	Why do you choose that time to depart from campus?	
	☐ Work/class schedule	☐ I am able to set my own schedule
	Transportation schedule	Other (please specify)
	Other responsibilities (e.g. personal obligations)	
11.	How often do you work/study on campus after 6:00 pm	?
	Never	
	1-2 days per month	
	☐ 1-2 days per week	
	☐ 3 or more days per week	
12.	How many hours are you scheduled to work/study on o	campus each week?
	Less than 17 hours	
	☐ 17-25 hours	
	☐ 26-30 hours	
	☐ 31-35 hours	
	☐ 36-40 hours	

13.	Please indicate how you commuted to campus each day last week. Please make one entry for each day of the week.											
		Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	Sunday				
	Drove alone the entire way											
	Drove alone, then took public transportation											
	Walked, then took public transportation											
	Shared ride/dropped off, then took public transportation											
	Bicycled and took public transportation											
	Rode in a private car with another person											
	Rode in a private car with 2-7 people											
	Rode in an 8- or more person vanpool											
	Dropped off at work (by taxi or other)											
	Bicycled											
	Walked											
	Out of office (sick, vacation, jury duty, business trip)											
	Scheduled day off (e.g. weekend)											
	Worked at home											
	Other (please specify)											
14.	Please indicate how you comn	nuted <u>from</u>		ch day <u>last</u> wee ease make one		day of th	o wook					
		Monday	Tuesday	Wednesday	Thursday	Friday	Saturday	Sunday				
	Drove alone the entire way											
	Took public transportation, then drove alone											
	Took public transportation, then walked											
	Took public transportation, then shared ride/dropped off											
	Took public transportation and bicycled											
	Rode in a private car with another person											
	Rode in a private car with 2-7 people											
	Rode in an 8- or more person vanpool											
	Dropped off at home (by taxi or other)											
	Bicycled											
	Walked											
	Out of office (sick, vacation, jury duty, business trip)											
	Scheduled day off (e.g. weekend)											
	Worked at home											
	Other (please specify)]				

15.	Why have you chosen your primary c		16.	If you drive, how many times a month, on						
	method? Please select the most import	ant reason.		average, do you use your own car for institute-						
	School/day care responsibilities			related business during the day?						
	☐ Time constraints			None						
	Second job			1 to 4 times per month						
	Cost			5 or more times per month						
	Convenience			☐ Not applicable						
	☐ No other option									
	Other (please specify)									
17.		e a car pool, wh	y not?	? Please select the most important reason.						
	Schedule is too variable									
	Live too far away									
	Takes too much time									
	Run errands on the way to/from cam									
	Would be trapped at work without a c									
	Had a bad experience carpooling in t									
	Don't know how to find people to carp	oool with								
	Not applicable									
	Other (please specify)									
18.	If you drive to <u>campus</u> , where is your	vehicle usually	parke	ed?						
	MIT parking lot									
	Cambridge parking lot									
	On-street parking									
	☐ Not applicable									
	Other (please specify)									
18a	If you chose MIT parking lot in Question	n 18, please sele	ect which	ich one.						
	158 Mass Ave Lot] Kresge Lot						
	2 Pacific Street Lot] Main Lot						
	70 Pacific Street Garage			N10 Lot						
	70 Pacific Street Lot			PSFC Lot						
	☐ Albany Street Garage			Reactor Lot						
	☐ Albany Street Lot] Sloan Lot						
	Amherst and Danforth Streets] W91 Lots						
	Carleton Street] W92 Garage and Lot						
	CRA Lot			☐ West Lot						
	Deacon Lot			Westgate Lot						
	☐ E51 Lot			Windsor Street Lot						
	☐ East Garage			WW15 Lot						
	☐ East Garage Annex Lot			Audrey Street						
	Hayward Garage			Other MIT parking lot						
	☐ Hayward Street Lot									
18b	If you chose Cambridge parking lot in	Question 18, ple	ase se	elect which one.						
	☐ 139 Mass Ave	, ,								
	Cambridge Center East Garage (und	er Marriott Hotel)							
	Cambridge Center North Garage (off		,							
	☐ Tech Square Parking Garage									
	☐ University Park Garage (Landsdowne	e Street)								
	☐ Other Cambridge parking lot									
18c	If you chose On-street parking in Ques	tion 18, please s	select w	which street.						
	☐ Albany Street	☐ Emily Street		☐ Pilgrim Street						
	☐ Allston Street	☐ Erie Street		☐ Portland Street						
	☐ Amesbury Street	☐ Fowler Stree	t	☐ Purrington Street						
	☐ Ames Street	☐ Franklin Stre	et	☐ Putnam Street						
	Amherst Street (East)	☐ Front Street		☐ Sidney Street						
	☐ Amherst Street (West)	☐ GE Way		☐ Smart Street						
	☐ Amherst Alley	☐ Green Street	t	☐ State Street						
	☐ Audrey Street	☐ Grove Street		☐ Talbot Street						
	☐ Blanche Street	☐ Hamilton Stre	eet	Technology Square 1						
	Broadway	☐ Hayward Stre	eet	Technology Square 2						
	☐ Brookline Place	☐ Henry Street		☐ Third Street						
	☐ Brookline Street	Landsdowne								
	☐ Carleton Street	☐ Magazine St		☐ Vassar Street						
	☐ Chestnut Street	☐ Main Street		☐ Village Street						
	☐ Cross Street	☐ Mass Ave		☐ Wadsworth Street						
	☐ Danforth Street	☐ Merriam Stre	eet	Waverly Street						
	Deacon Street	Osborn Stree	et	☐ Windsor Street						
	☐ Dock Street	☐ Pacific Stree		Other on-street parking						
	☐ Endicott Street	Peters Street								

19.	If you drive only part of the way, where do you usually part	·k?				
	│					
	On-street parking					
	Not applicable					
	☐ Other (please specify)					
20.	Do you get your public transit pass from MIT?					
	Yes					
	│					
21.	If you take public transportation, what is the most importa	nt reason why	?			
	Convenience	<u></u>	•			
	☐ Cost					
	My only alternative					
	☐ Concern for the environment ☐ Not applicable					
	☐ Not applicable ☐ Other (please specify)					
22.	If you do not take public transportation, what is the most	important reaso	n why not	?		
	☐ Takes too much time		•			
	Costs too much					
	Concerned about security					
	☐ Don't have access to public transportation☐ Uncomfortable environment					
	Not applicable					
	☐ Other (please specify)					
23.	We are interested in learning how long it takes you to get to					
	and from MIT. Using whatever mode of transportation you normally use, please indicate your average commute time	On a normal ((in minutes)		a good day n minutes)	On a bad day	
	door-to-door.	(111 1111111111111111111111111111111111	, ("	i illilidies)	(in minutes)	
	Your commute to MIT?					
	Your commute from MIT?					
24.						
25.	What is the <u>average daily</u> roundtrip cost of your commute Are you interested in (please mark all that apply)	to WIII? \$				
25.	Are you interested in (please mark all that apply)					
	☐ Carpooling					
	☐ Carpooling ☐ Vanpooling					
	☐ Vanpooling ☐ Public Transportation					
	□ Vanpooling□ Public Transportation□ Biking/Walking					
						
26.	 Vanpooling Public Transportation Biking/Walking None Other (please specify) 	1		1	Did not	
26.			Used	Not Used	Did not know	
26.	□ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option.		Used	Not Used		
26.	 □ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies 	s or	Used	Not Used	know	
26.	 Vanpooling Public Transportation Biking/Walking None Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime 	s or		Not Used	know	
26.	 Vanpooling Public Transportation Biking/Walking None Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules 	s or	Used	Not Used	know	
26.	 Vanpooling Public Transportation Biking/Walking None Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling 	s or		Not Used	know	
26.	 Vanpooling Public Transportation Biking/Walking None Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business 			Not Used	know	
26.	 Vanpooling Public Transportation Biking/Walking None Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling 			Not Used	know	
26.	 Vanpooling Public Transportation Biking/Walking None Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business 			Not Used	know	
26.	 □ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business e) Onsite services (e.g. atm, dry cleaning, post office, sund 			Not Used	know	
26.	 □ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business e) Onsite services (e.g. atm, dry cleaning, post office, sund f) On-site information on transit routes and schedules g) Shuttle to train station (EZ Ride, Tech Shuttle) 			Not Used	know	
26.	 □ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business e) Onsite services (e.g. atm, dry cleaning, post office, sund f) On-site information on transit routes and schedules g) Shuttle to train station (EZ Ride, Tech Shuttle) h) On-site T-pass sales 			Not Used	know	
26.	 □ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business e) Onsite services (e.g. atm, dry cleaning, post office, sund f) On-site information on transit routes and schedules g) Shuttle to train station (EZ Ride, Tech Shuttle) h) On-site T-pass sales i) CARAVAN ride matching program 			Not Used	know	
26.	 □ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business e) Onsite services (e.g. atm, dry cleaning, post office, sund f) On-site information on transit routes and schedules g) Shuttle to train station (EZ Ride, Tech Shuttle) h) On-site T-pass sales i) CARAVAN ride matching program j) Preferential or reserved parking for carpools/vanpools 			Not Used	know	
26.	 □ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business e) Onsite services (e.g. atm, dry cleaning, post office, sund f) On-site information on transit routes and schedules g) Shuttle to train station (EZ Ride, Tech Shuttle) h) On-site T-pass sales i) CARAVAN ride matching program j) Preferential or reserved parking for carpools/vanpools k) Secure bike storage 			Not Used	know	
26.	 □ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business e) Onsite services (e.g. atm, dry cleaning, post office, sund f) On-site information on transit routes and schedules g) Shuttle to train station (EZ Ride, Tech Shuttle) h) On-site T-pass sales i) CARAVAN ride matching program j) Preferential or reserved parking for carpools/vanpools k) Secure bike storage l) Showers and lockers 			Not Used	know	
26.	 □ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business e) Onsite services (e.g. atm, dry cleaning, post office, sund f) On-site information on transit routes and schedules g) Shuttle to train station (EZ Ride, Tech Shuttle) h) On-site T-pass sales i) CARAVAN ride matching program j) Preferential or reserved parking for carpools/vanpools k) Secure bike storage 			Not Used	know	
26.	 □ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business e) Onsite services (e.g. atm, dry cleaning, post office, sund f) On-site information on transit routes and schedules g) Shuttle to train station (EZ Ride, Tech Shuttle) h) On-site T-pass sales i) CARAVAN ride matching program j) Preferential or reserved parking for carpools/vanpools k) Secure bike storage l) Showers and lockers 			Not Used	know	
26.	 □ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business e) Onsite services (e.g. atm, dry cleaning, post office, sund f) On-site information on transit routes and schedules g) Shuttle to train station (EZ Ride, Tech Shuttle) h) On-site T-pass sales i) CARAVAN ride matching program j) Preferential or reserved parking for carpools/vanpools k) Secure bike storage l) Showers and lockers m) Zip car 			Not Used	know	
	 □ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business e) Onsite services (e.g. atm, dry cleaning, post office, sund f) On-site information on transit routes and schedules g) Shuttle to train station (EZ Ride, Tech Shuttle) h) On-site T-pass sales i) CARAVAN ride matching program j) Preferential or reserved parking for carpools/vanpools k) Secure bike storage l) Showers and lockers m) Zip car n) Fast lane transponders o) MIT hands free garage access 	ries, etc.)			know	
26.	 □ Vanpooling □ Public Transportation □ Biking/Walking □ None □ Other (please specify) Which of the following have you used? Please make one entry for each option. a) Guaranteed Ride Home program in case of emergencies unscheduled overtime b) Flexible hours to accommodate schedules c) Subsidy for public transit and carpooling/vanpooling d) MIT vehicle used for business e) Onsite services (e.g. atm, dry cleaning, post office, sund f) On-site information on transit routes and schedules g) Shuttle to train station (EZ Ride, Tech Shuttle) h) On-site T-pass sales i) CARAVAN ride matching program j) Preferential or reserved parking for carpools/vanpools k) Secure bike storage l) Showers and lockers m) Zip car n) Fast lane transponders 	ries, etc.)			know	

28.	We would like to know how your travel patterns might be affected by seasonal weather conditions. If we sent you this survey during a cold winter month, would your commute method to and from MIT be any different than it was last week? Please describe.
29.	Thinking about your <u>personal needs</u> , what can MIT do to make your commute to and from campus
23.	easier? What is MIT doing right, and what could MIT do better?
30.	Thinking about the <u>needs of the MIT community</u> , along with a concern for environmental issues, what are the <u>two</u> most important things MIT should do to enhance the commuting experience? Please be specific.

Thank you for responding to this survey!

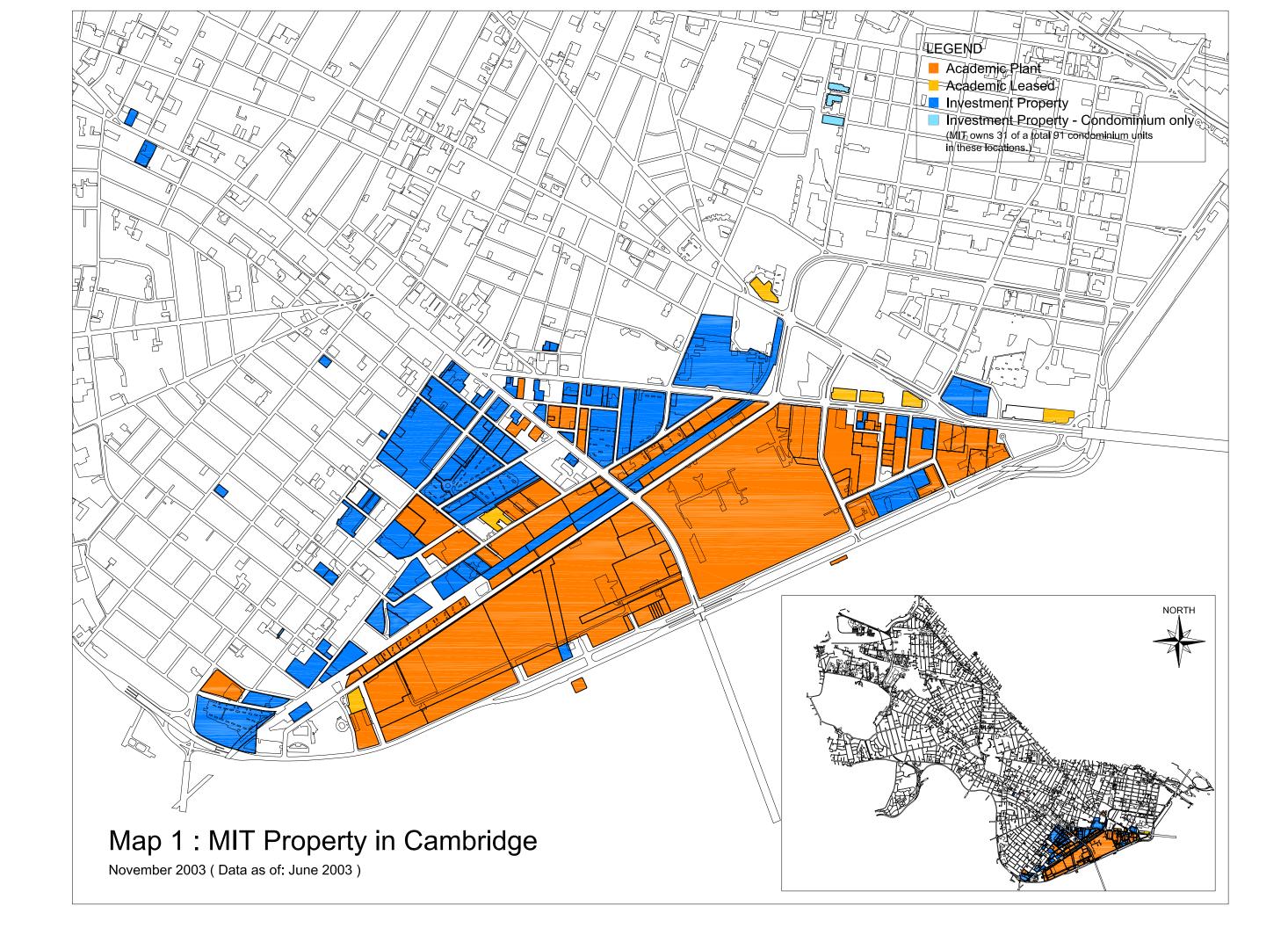
MIT Transportation Survey 2002 (off-campus respondents only)

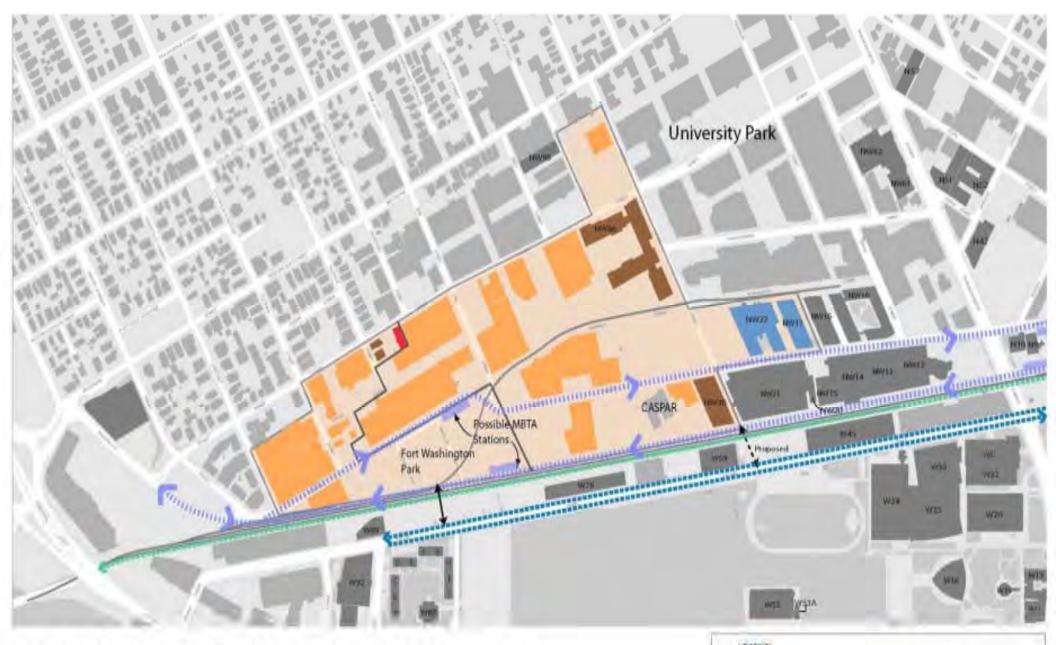
13. Please indicate how you commuted to campus each day last week.

			Tues	Tuesday We		Wednesday		Thursday		Friday		Saturday		nday
	Count	Percent	Count	Percent	Count	Percent	Count	Percent	Count	Percent	Count	Percent	Count	Percent
Drove alone entire way	1.641	25.3	1.598	24.8	1.667	25.8	1.633	25.4	1,513	23.6	525	9.5	460	8.4
Drove alone, then took public transportation	224	3.4	255	4.0	238	3.7	232	3.6		3.2	13	0.2	11	0.2
Walked, then took public transportation	1,668	25.7	1,729	26.8	1,827	28.3	1,789	27.8	1,675	26.1	367	6.6	327	6.0
Shared ride/dropped off, then took public transportation	138	2.1	147	2.3	137	2.1	144	2.2	131	2.0	7	0.1	11	0.2
Bicycled, then took public transportation	58	0.9	55	0.9	58	0.9	52	0.8	48	0.7	16	0.3	10	0.2
Rode in a private car with	288	4.4	284	4.4	282	4.4	278	4.3	287	4.5	97	1.7	69	1.3
Rode in a private car with 2-7 people	48	0.7	57	0.9	56	0.9	50	0.8	50	0.8	23	0.4	17	0.3
Rode in an 8- or more person vanpool	43	0.7	44	0.7	43	0.7	41	0.6	38	0.6	4	0.1	7	0.1
Dropped off at work (by taxi or other)	51	0.8	52	0.8	57	0.9	58	0.9	50	0.8	19	0.3	18	0.3
Bicycled	760	11.7	776	12.0	692	10.7	679	10.6	625	9.7	260	4.7	244	4.4
Walked	992	15.3	985	15.3	955	14.8	970	15.1	976	15.2	483	8.7	467	8.5
Out of office (sick, vacation, jury duty, business trip)	168	2.6	141	2.2	128	2.0	179	2.8	298	4.6	166	3.0	162	3.0
Scheduled day off (e.g. weekend)	89	1.4	40	0.6	37	0.6	44	0.7	151	2.4	3,053	55.0	3,139	57.2
Worked at home	123	1.9	107	1.7	100	1.6	113	1.8	210	3.3	449	8.1	472	8.6
Other (please specify)	207	3.2	179	2.8	173	2.7	168	2.6	155	2.4	66	1.2	73	1.3
Overall	6 498	100.0	6,449	100.0	6,450	100.0	6,430	100.0	6,413	100.0	5,548	100.0	5,487	100.0

14. Please indicate how you commuted <u>from campus</u> each day last week.

			Tuesday		Wedn	Wednesday		Thursday		Friday		Saturday		nday
	Count	Percent	Count	Percent	Count	Percent	Count	Percent	Count	Percent	Count	Percent	Count	Percent
Drove alone entire way	1.608	25.2	1,584	25.0	1,647	26.0	1,602	25.2	1,495	23.7	528	9.7	468	8.7
Drove alone, then took public transportation	228	3.6	251	4.0	235	3.7	227	3.6	201	3.2	12	0.2	4	0.1
Walked, then took public transportation	1,685	26.4	1,729	27.2	1,735	27.4	1,765	27.8	1,630	25.8	340	6.3	311	5.8
Shared ride/dropped off, then took public transportation	115	1.8	127	2.0	130	2.1	126	2.0	127	2.0	6	0.1	5	0.1
Bicycled, then took public transportation	49	0.8	47	0.7	48	0.8	42	0.7	40	0.6	14	0.3	12	0.2
Rode in a private car with Mନ୍ଧୀନଥ୍ୟ person	275	4.3	301	4.7	308	4.9	285	4.5	322	5.1	105	1.9	79	1.5
Rode in a private car with 2-7 people	56	0.9	65	1.0	58	0.9	73	1.2	81	1.3	29	0.5	20	0.4
Rode in an 8- or more person vanpool	58	0.9	60	0.9	68	1.1	63	1.0	46	0.7	14	0.3	14	0.3
Dropped off at work (by taxi or other)	25	0.4	27	0.4	33	0.5	31	0.5	33	0.5	12	0.2	8	0.1
Bicycled	771	12.1	758	11.9	683	10.8	678	10.7	605	9.6	257	4.7	239	4.4
Walked	950	14.9	941	14.8	938	14.8	926	14.6	919	14.5	461	8.5	427	7.9
Out of office (sick, vacation, jury duty, business trip)	177	2.8	135	2.1	134	2.1	181	2.9	289	4.6	171	3.1	164	3.1
Scheduled day off (e.g. weekend)	82	1.3	38	0.6	37	0.6	44	0.7	151	2.4	2,985	54.9	3,072	57.2
Worked at home	117	1.8	105	1.7	96	1.5	110	1.7	207	3.3	442	8.1	466	8.7
Other (please specify)	183	2.9		2.8		2.9	193	3.0		2.7	61	1.1	83	1.5
Overall	6.379	100.0	6,348	100.0	6,331	100.0	6,346	100.0	6,319	100.0	5,437	100.0	5,372	100.0



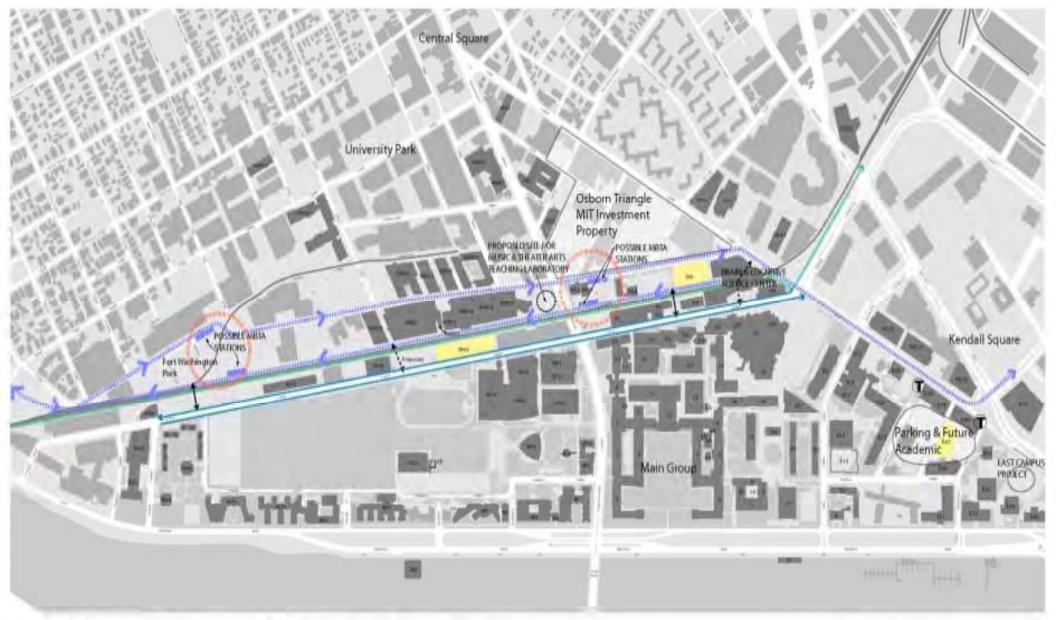


Map 2 - Campus Planning Challenges & Opportunities in Special Districts 8 & 8A

Academic Zone SD-8/SD-8A
(FAR = 1,0/70)

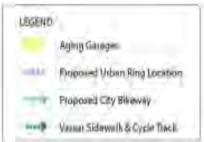
Commercial /Industrial
Proposed Urban Ring Location
Résidential
Proposed City Rikeway

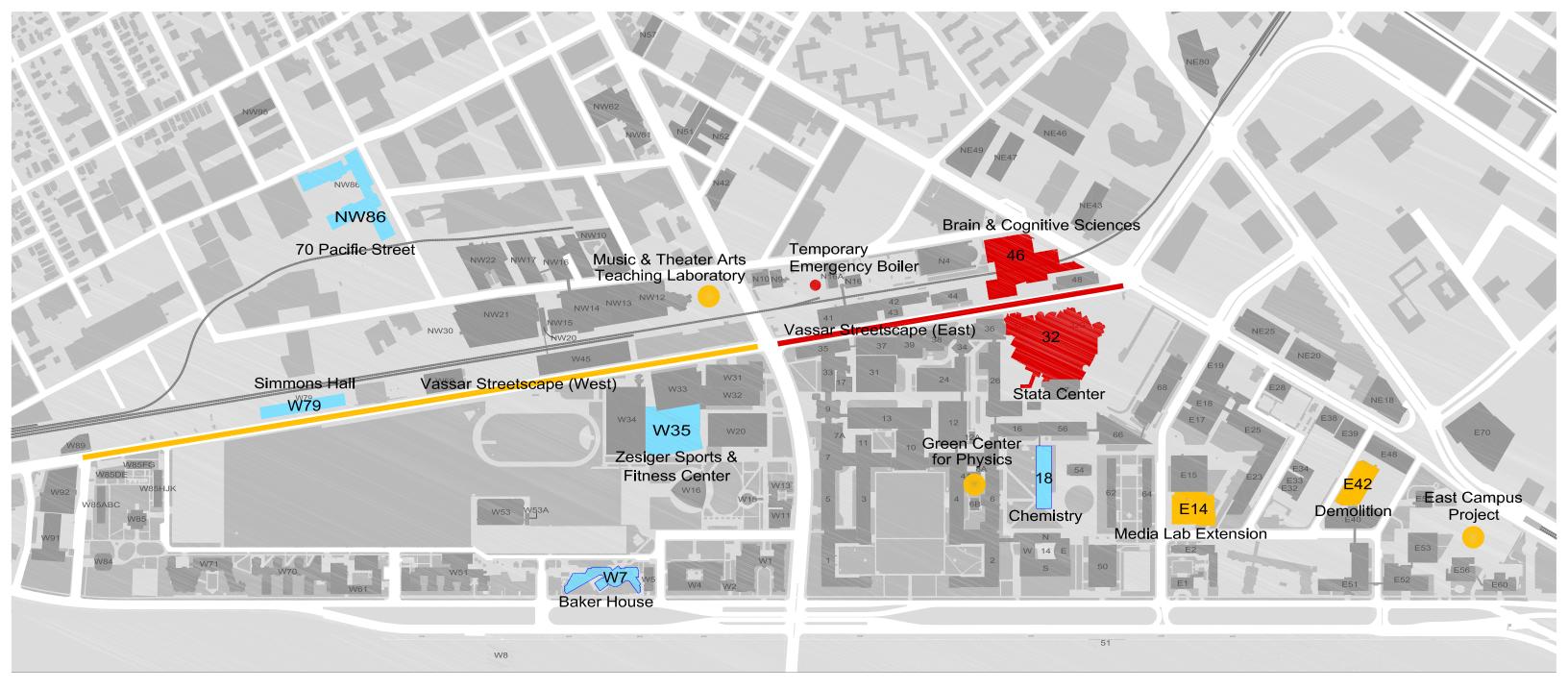
Miced-use
Vasser Sidewalik & Cycle Track



Map 3 - Campus Planning Challenges & Opportunities

Campus Planning & Project Development - MIT Department of Facilities









Map 4: MIT Construction Projects

November 2003

